

43. *Sir R. Temple raises the Estimates.*—On the 31st January,¹ Sir R. Temple wrote, concerning Tirhut, the first of a long series of minutes in which he dealt successively with the probable wants of each of the distressed districts. The Tirhut District contained a population of four millions of people and had received, on Sir G. Campbell's distribution of January 13th, an allotment of 275,000 maunds. The estimate now made of its requirements was four millions of maunds. The local officers calculated that they might have a million of people on their hands, receiving relief in some shape or other; the worst months would be May and June, but the months of April, July, August, and September would be almost as bad; to feed a million of persons for six months would require three and a half million of maunds; altogether it would be safer to provide four millions; and to ensure getting this quantity it was necessary to make contracts for the transport of five millions. Sir G. Campbell demurred to this estimate as excessive: it assumed that 25 per cent. of the population of the whole district, and 50 per cent. of that of the part most distressed, would be on relief—a proportion never known before; it made no allowance for reserved stocks or for the quantity, small as it was, produced in the harvest; it took no account of private trade which was however fairly active; and it reckoned on giving 4 maunds of food (or $1\frac{1}{2}$ lbs. a day for seven months) to each person on relief, whereas he himself considered that to allow 1 lb. per day or $1\frac{1}{2}$ maunds per head for four bad months was sufficient.² Finally, Sir G. Campbell held that if two million maunds were sent to Tirhut, it would be ample, and probably this (or 1,00,000 maunds a week) would be as much as the district resources could accomplish. The Governor General replied³ that he was much disappointed to find that the district officers had “so long neglected fully to appreciate the requirements of those parts of the country,” that Sir R. Temple had—

“exercised a wise discretion in recommending that four millions of maunds of grain shall be provided for the district of Tirhut, and that arrangements should be made for the transport into the interior of a larger quantity, in order that the probability that part of the transport arrangement will break down may be guarded against beforehand.”

Sir George Campbell made no further expostulation against Sir R. Temple's estimates.

44. *The Viceroy approves increased Estimates.*—On the 13th February,⁴ the Government of India reported to the Secretary of State, with an expression of their full approval, Sir R. Temple's estimate of the needs of Champáran—one million maunds to feed an average of 217,000 persons⁵ for eight months at $\frac{3}{4}$ seer a day, and 6,50,000 maunds for Saran, of which 1,50,000 would be provided by the Hatwa Raja for his own estate. This, added to the amount already estimated for Tirhut, brings out a total of about 180,000 tons required for North Behar: the Government had already made arrangements for this quantity, and had no doubt they would be able to lay it down before the 15th June.

45. *The estimate for Purneah.*—It is unnecessary to particularise all of these estimates necessarily made by Sir R. Temple in extreme haste and based on the best information he could obtain, though he himself fully admitted the imperfectness of that information. One more instance will suffice—that of Purneah. In this district he estimated that half the population were not likely to be distressed at all, and that less than half of the remainder would be severely distressed, and he recorded⁶ that “the distressed tracts are receiving much benefit from private trade, are easily accessible by means of a trunk road and a navigable river (Mahanadi) and are close to tracts blessed with good harvests.” The Collector estimated that 130,000 persons would need relief, 85,000 of them being in the distressed tracts, and this estimate was “carefully made with percentages separately taken out on each caste or class as given in the Census Statement.” The Commissioner raised the estimate to 150,000. Sir R. Temple, following the Behar precedents, calculated that the number on relief would be 240,000,

¹ B. B. I., 224.

² Mr. Metcalfe (Additional Commissioner for Behar in 1874) states that from 1 to $1\frac{1}{2}$ lbs. is the ordinary food of an able-bodied person, but that he found from actual sales in the famine that 10 oz. per head per diem was enough, and in future estimates he should reckon 10 seers per month, or $1\frac{1}{2}$ maunds for six months, a sufficient supply. (Reply to Famine Commission.) Mr. Kirkwood writes to the same effect, that $1\frac{1}{2}$ lbs. was an excessive allowance. And Mr. Magrath states that in Madhobani the actual ration given in poor-houses was 1 lb. of rice to an adult, and half to a child.

³ B. B. I., 230.

⁴ *Id.* I., 241.

⁵ On the assumption that from 5 to 10 per cent. of the population of different parts of the district would come on relief.

⁶ B. B. III., 268.

and that over 23,000 tons must be imported to feed them. What was the result? The largest number in receipt of direct relief at any one time was¹—

On relief-works in May	-	-	-	31,029
On charitable relief in July	-	-	-	36,180
				<hr/> 67,209

The average number relieved daily for seven months was—

On relief-works	-	-	-	18,230
Charitable relief	-	-	-	14,643
				<hr/> 32,873

Besides this, Rs. 1,13,125 was advanced in cash; 4,587 tons of grain were lent and 10,762 sold (a part of which, however, was sold after relief operations were over). Assuming that every 23 seers sold or lent, and every sum of Rs. 1-14 lent, supported one person for a month, the number relieved in this way for seven months was 115,367, making a total of 148,240 in receipt of relief of all kinds; a number a little above the Collector's estimate and far below Sir R. Temple's. When it is considered that many received relief in different forms and are counted twice over in this calculation, and that much of the relief that was given proceeded directly from the largeness of the means of relief provided (the grain having to be disposed of somehow), the logical conclusion seems to be that the Collector's estimate of the real wants of his district was as much above the mark as it was held to be below it.

46. *Amount required by increased estimates.*—On the 27th February² the Local Government represented that the following allotments, made in accordance with Sir R. Temple's minutes and requirements, had almost swallowed up the 340,000 tons provided, and that it was necessary to arrange for a reserve—

	Tons.
Tirhut	148,000
Champaran	37,000
Saran	18,500
South Behar and Soane Canal	18,500
Bhagalpur	25,900
Monghyr	11,000
Purneah	18,500
Rajshahai Division	55,500
Total	<hr/> 332,900 <hr/>

In some of these districts the requirements might be fixed still higher before Sir R. Temple finished his tour; and besides these there was cause for anxiety about the drain on Eastern and Central Bengal, in which parts prices were rising. The Viceroy replied³ that he had made the necessary arrangements, and from a despatch of March 20th it appears that altogether 465,000 tons had been arranged for, of which 385,500 tons were to come from beyond sea, and 160,000 tons had already arrived. This increase in the quantity purchased, it is explained, was mainly due to Sir R. Temple's calculation that $1\frac{1}{2}$ lbs. and not 1 lb. should be taken as the average daily consumption. Of the whole sum provided (which is put elsewhere⁴ as 453,000 tons, independent of purchases by Rajas, Zemindars, &c., with funds advanced by Government) 280,000 tons had been ordered from Burma.

47. *Lord Salisbury finds the increased estimates too low.*—On the 19th March⁵ a despatch was written by the Secretary of State urging a large provision of grain. He referred to a telegram of March 4th, which ran—

* * * “The area of probable severe distress now well ascertained comprises parts of districts of Tirhut, Saran, Chumparan, Bhagulpore, Purneah, Dinagepore. Expect at the worst period to have something under three million persons on the hands of Government in these districts for three months, from end of May to end of August, a smaller number during April, May, and September, and still fewer in March, October, and November. There will be distress in nine other districts, but it will not be general. Orders of Government rice amount to 420,000 tons, of which 350,000 from beyond sea.”

“Para. 5. The best authorities appear to agree with Sir Richard Temple in fixing the average ration necessary for the support of persons under relief at three-quarters of a seer of rice a day. According to the estimate contained in your telegram you would therefore require for the three months of severest pressure a total quantity of 185,000 tons. If three-quarters of this pressure be assumed for the three months which you place next in severity, and half this pressure for the three months of lightest scarcity, the total amount of rice required, supposing that you have provided no other grain,

¹ MacD., p. 207.

² B. B. I., 293.

³ *Id.* I., 315.

⁴ *Id.* I., 355.

⁵ *Id.* I., 322 (April 2nd).

will be 413,000 tons. Sir Richard Temple, in his minute of the 31st January, upon the distress in Tirhut (see page 224), states that in most parts of Mudhobunnee, and in some parts of Durbhanga, the distress will not disappear at the earliest till December; and in these two districts alone he calculates that it will fall to the Government to support more than 800,000 persons. It will not be safe, therefore, to assume for the closing months of the distress less than half the pressure of the famine at its height.

"6. If these conclusions are a just inference from the figures with which you have furnished me, it results that you have a supply of 420,000 tons of rice to meet a demand which you estimate at 413,000 tons. But this is the demand of the six most afflicted districts only. You observe that there will be partial distress in nine other districts. Sir Richard Temple apprehends (5th February) that half a million distressed persons from Nepal may come to the relief-works and the rice stores of your Government. Moreover 720 tons a week are destined (14th February) for Gya, Arrah, and the Soane Canal; 25,000 tons have been allotted (12th February) to the districts Rajshahye other than Dinagore, and the Lieutenant-Governor is anxious to retain 20,000 tons reserve to meet the probable want of Eastern Bengal. I observe also that Government grain is being stored in Chota Nagpore and that relief-works have been commenced in Burdwan, and that severe distress is reported to exist among the Sonthals. It is obvious, moreover, that, as prices advance, the distribution of Government grain cannot be confined to those who are 'on our hands,' that is to say, who are in the receipt of the wages or the alms of Government. There will be numbers who have money, or can procure enough to enable them to work on their own land, if only they can turn that money into grain at a reasonable rate, and against these the Government cannot safely close its stores. * * *

"7. Even, therefore, if no disturbing cause should derange your calculations, and if I may assume, from your silence as to provision of any other grain, that you do not in them rely upon any such provision, it seems probable that 420,000 tons will fall considerably short of the quantity required. But with the starvation of multitudes as the possible penalty of a mistake, I am convinced that you will not trust to any exact calculation. There are numerous contingencies which may diminish your supply, or may increase the demand upon you. A liberal allowance must be made for the possible failure of the arrivals on which you count, for the shrinkage of transport, for the chance of accident, for the loss that may result by the damage of rice by rain, for the mistakes of those who act under you. On the other hand, it may possibly be that the calculation on which you are relying will fall short of the truth. The area or the duration of the distress with which it is your duty to deal may be larger than you anticipate. Past experience will not lead you to place unbounded trust on the estimates that are supplied to you.

"These inadequate appreciations led you in November last confidently to name 2,500,000 as the number to be relieved. In March you raised that estimate under the guidance of fuller information to 3,000,000. It is impossible to assume with certainty that the tendency to an inadequate appreciation of the danger, which you have already noted in some of your local officers, has altogether ceased to operate.

"8. These considerations lead me to apprehend that your supplies, as hitherto reported to me, are not sufficient to protect you against the possibility of a serious deficiency. They may be adequate if the most favourable anticipations should be justified by the event, but if any unforeseen aggravation of your difficulties were to occur, your Government might be involved in embarrassment of the greatest character. * * * I have no wish to limit your discretion as to the mode of providing the requisite supplies, but I request you to take early measures for securing not only the quantity indicated by your present calculations, but also a very ample margin to meet contingencies, the exact nature of which it is impossible to foresee, but which in an emergency of this magnitude are in some form or other likely to occur."

48. *Government of India refuses to raise its estimates.*—The Government of India replied¹ on the 24th April, stating what had been decided on up to date. Sir R. Temple in his minute of 28th March had given a summary of his estimates of the area and requirements of the distressed tract—

DIVISION.	DISTRESSED AREA.		Population likely to come on relief at worst time.	Percentage to distressed Population.	Percentage to Total Population.	Grain allotted.
	Square Miles.	Population.				
Patna - - -	16,666	8,124,164	1,794,000	22.08	13.67	Total. 241,000
Bhagalpur - -	7,623	2,957,607	746,650	25.24	11.29	70,000
Rajshahni - -	8,098	3,491,936	802,863	20.87	8.2	77,000
Total - - -	32,387	14,573,707	3,343,513	—	—	388,000

Besides this, about 9,500 tons more had been allotted to Hazaribagh, making a total of 397,500 tons allotted, of which 50,000 were intended for a reserve. The Government

had, however, purchased or ordered 490,000¹ tons, making a reserve of 1,12,500 tons.

They went on to explain that the number of persons expected to be on the hands of Government included the classes of whom the Secretary of State had spoken, whose needs would be satisfied with permission to buy the Government grain; that though their estimate of the number to be relieved, at the worst time, had risen from two and a half to three and a half millions, they expected that the numbers would be very much smaller during a considerable part of the seven months period; and that in fact in April, the second month of the seven, the number on relief was 1,200,000, or about half the estimate, and the issues of grain from Government stores had been as yet inconsiderable. On the whole, therefore, the Government of India declined to increase its purchases.

49. *Account of Burma purchases.*—On the 9th July,² the Chief Commissioner of Burma (Sir A. Eden) having completed the duty entrusted to him of purchasing grain for Bengal, reported on the whole history of the transaction. The exports from Burma in previous years had been—

	Tons.
1870 - - - - -	364,555
1871 - - - - -	477,984
1872 - - - - -	660,435
1873 - - - - -	604,325

The crop of 1873, to come to market in 1874, was an unusually fine one, and was estimated at 750,000 tons for export; of this, about 100,000 tons is usually taken for China and the eastern parts, and tonnage had been taken up to carry 400,000 tons to those countries and to Europe. This left 350,000 tons available for purchase by Government. Altogether 289,534 tons were purchased and shipped. This was done through the agency of two local firms whose business it was to purchase the rice on Government account at market rates (subject to constant communication with the Chief Commissioner), to prepare it for export by husking and cleaning, to pack it in gunny bags and place it on board ship at the port of despatch: for this they received a commission of 3 per cent. on their outlay. In January and February the shipments averaged 1,000 tons a day, in March they reached 3,000, in April and May they averaged 2,000. On one occasion a steamer of 1,700 tons loaded in 26 hours. The average cost of all the rice from first to last, when placed on board ship, i.e., "free on board," was Rs. 2-10-11 per maund; it was cheapest between the 15th January and the 6th March, at which time the heaviest purchases were made. The freight from Rangoon to Calcutta varied from Rs. 10 to Rs. 14 per ton.

50. *Further Demands from Bardwan in September.*—On the 19th September,³ Sir R. Temple reviewed the condition of things in Hughli and Bardwan, in which Districts the holding off of the rains had brought up the numbers largely. There were then 75,000 people on relief in Bardwan and 45,000 people in Hughli, almost all on charitable relief, and it was admitted that they were in good case, that the pressure had been very slight, and that many people had learnt the arts of imposture. Accordingly, it was intended to administer relief with greater strictness, and it was hoped that the numbers would fall by one-third in October, by a half in November, and by three-fourths in December. It was calculated that about 4,000 tons would be required to

¹ This grain was obtained from the following quarters (L, 375):—

	Tons.
By Government of India, from Burma - - -	290,000
Madras - - - - -	41,804
Saigon - - - - -	55,000
Chittagong - - - - -	12,420
Miscellaneous - - - - -	593
Total - - - - -	399,817
By Government of Bengal, from Bengal, Orissa, North-Western Provinces, and Central Provinces - - -	69,570
By Government of Bengal, sanctioned purchase from North-Western Provinces if required - - - - -	9,323
By Hutt and Co. (Barristers) - - - - -	11,000
Total - - - - -	89,893
Grand Total - - - - -	489,710

² L. 374, 1,000 tons had been sold to Nepal.

³ B. II, 30.

⁴ B. II, 47.

feed the numbers thus estimated, and though admitting that the habit of importation existed, and that the advantages of trade and communication were first-rate, Sir R. Temple proposed to draw this grain from the Government reserve in Calcutta, instead of buying it locally. The Government of India, however, refused this application, and directed that purchases should be made in the local markets. "His Excellency in Council considers it of minor importance that some surplus stock should be left upon the hands of Government; it was always contemplated that this would be the case."

51. *Stocktaking of Surplus Grain.*—On the 15th September,² stock was taken of the Government grain in store, and it was found to amount to 90,000 tons.³ Of this, it was estimated that about 23,000 tons would be used before the relief operations ceased; some 28,000 tons were scattered about the distressed districts in hundreds of petty granaries, this was to be sold locally to the best advantage; the remainder, 39,000 tons, was collected in considerable quantities in large depôts, and this the District officers were directed to sell, from time to time, between October and March. It was hoped that this grain would realise Rs. $1\frac{1}{2}$ to $1\frac{3}{4}$ per maund.⁴ These stocks were independent of the Government reserve of grain in Calcutta, which also was advertised⁵ for sale on different days during November, December, January, and which amounted in all to a little over 20,000 tons (595,000 maunds exactly).

52. *Summing-up of the Story.*—In his final minute,⁶ Sir R. Temple computes that altogether 460,000 tons of Government grain were imported into the famine tract (exclusive of the reserve in Calcutta), of which about 105,000 would be unexpended at the end of October. The total expenditure⁷ up to the first week of October had been 3,13,000 and possibly 15,000 tons more might be required. The surplus was about 85,000,⁸ or including the Calcutta reserve 105,000 tons; this amounts to about 20 per cent. on the total provision of Government grain. This surplus was estimated to bring in Rs. 37,00,000, or Rs. 35–4 a ton, about a quarter of what the grain cost the Government.

"If all the circumstances are considered, if all the necessities to be met are borne in mind, the surplus will not appear excessive. At two very critical periods the Government were not without grounds for fearing that the total provision of grain might not suffice. Towards the end of May there was hardly a responsible officer in the very distressed Districts who considered that the provision of grain for his district or sub-division was too large; and there were many who thought their provision would not suffice. During the last days of August again, and the first days of September, there was a very general belief that the supplies of grain then in store would be inadequate, and that fresh Government importations would have to be begun.

"In previous Indian famines, the months of September, October, and November, have been marked by very high prices and by some misery and even mortality. Experience, therefore, warned us to guard against such contingencies. The unusual breadth, and the generally abundant produce of the early autumn crops of 1874, constituted, as above observed, the main cause of the cessation of the demand for Government grain about the end of September or the beginning of October. Another cause, as already seen, was the relief given so constantly throughout the summer months helped to enable the people to support themselves six weeks earlier than was expected in February 1874."

53. *Cost of the Grain.*—The purchase⁹ of this grain (480,000 tons) is stated to have cost 440 lakhs of rupees or Rs. 91 $\frac{2}{3}$ per ton, or 12 $\frac{1}{2}$ seers per rupee, or Rs. 3–5–11 per maund. The Burmese rice, 290,000 tons, cost only Rs. 2–10–11 per maund at the port of export, or 213 lakhs in all; so that the remaining 190,000 tons must have cost 227 lakhs of rupees, or Rs. 120 per ton, or 9 $\frac{1}{2}$ seers per rupee. Possibly, however, the freight to Calcutta of the Burmese rice, which was more than 30 lakhs of rupees, is here included in the cost price. Including the cost of transport, the total sum spent on the purchase and delivery of these 480,000 tons was Rs. 6,47,40,000, or Rs. 135 per ton,¹⁰ or 8 $\frac{1}{2}$ seers per rupee. The cost of transport was about Rs. 42 per ton, or almost 50 per cent. of the cost of purchase. These figures agree closely with Mr. Bernard's estimate of February 13th, according to which 340,000 tons would cost three millions sterling, and transport would cost Rs. 42 $\frac{1}{2}$ per ton.

¹ B. B. II., 50.

² *Ib.* II., 53.

³ Afterwards stated as 100,188 tons, in Sir R. Temple's final minute. See B. B. II., 109.

⁴ The author of the Black Pamphlet says that much of this grain was sold at from 30 to 50 seers per rupee, and that some was taken down by the purchasers to Calcutta and sold at a profit there. Mr. Lewis, who was Magistrate-Collector of Dinajpur in 1874, says that the Burma rice could hardly be got rid of at 4 annas per maund.

⁵ B. B. II., 55.

⁶ *Ib.* II., 98. (T.)

⁷ *Ib.* II., 109. (T.)

⁸ Apparently this leaves 17,000 tons to be accounted for by "shrinkage." ⁹ *Ib.* II., 110. (T.)

¹⁰ Colonel Burn states (Reply to Famine Commission) that his importations on behalf of the Darbhanga Raj cost Rs. 205 per ton, so that Government worked cheaper than he did.

SALE OF GRAIN TO THE PUBLIC.

54. *First Suggestion in December.*—The first attack on the principle that the Government grain was only to be given to labourers on relief-works, was made by Mr. Robinson, the Relief Commissioner of Rajshahi, who reported¹ on the 2nd December that in a large part of Dinajpur the stocks were small; there were no traders who could import from a distance; and there would be a great want of rice in a couple of months; he, therefore, recommended that Government should import largely to a central depôt, and sell at the market rate or slightly under it to petty dealers, village headmen, &c., who would themselves carry the grain to the villages and distribute it to their families, dependants, and others. The Government of India replied² (January 12th) that, although this proposal was not “in principle opposed to the policy of Government in exceptional localities, there was not sufficient evidence to show the expediency of carrying it out in the District concerned;” they doubted the non-existence of capable traders, and they considered that the Zemindars ought to be stimulated to take advances in order to do this work.

“But it should be understood publicly that the stores of Government grain are either for relief-works or for relief committees, and for no other purpose, so that any discouragement may be avoided as regards any local trade which may exist or may yet spring up.”

In³ the conference held on January 8th, the Viceroy thus expressed his views on the subject:—

“He thought it most essential that no idea should get abroad that Government was going to open stores and take upon itself the task of feeding the whole population. All the Government could do would be to supplement the action of private trade. This could not be too distinctly understood. But in special limited Districts, where from one cause or another private trade might be found not to bring in supplies, Government might, he thought, properly sell grain at its price at the nearest large grain mart, with the addition of something for carriage, as was done in the Irish famine. The sale of Government grain in this manner would continue until the supply brought in by private trade was found sufficient to meet the wants of the people. It would then at once be discontinued, and the grain in Government stores would be devoted to its legitimate object, namely, the supply of food to people engaged on Government relief-works, and the distribution through the relief committees of gratuitous relief to that limited portion of the population who stood in absolute need of it.”

55. *Sale permitted under conditions.*—On the 26th January, the rules⁴ issued for the guidance of the local Relief Committees permitted them to sell grain below the market rates, or to advance it as a loan to people whose caste usages and feelings preclude the application of a labour test, and who are in great distress; or, if a serious deficiency of grain is apprehended, they might arrange to sell grain to local traders, fixing the price according to that of the nearest market plus cost of transport; such sales to be stopped as soon as local trade receives sufficient supplies.

56. *Probability of more general sale considered.*—In the estimate framed⁵ on 13th February, in which allowance is made for the purchase of 340,000 tons of grain, it is admitted that the stock thus laid in is very much in excess of the probable requirement of relief labour alone.

“It is quite clear that labourers on Government works alone will not be numerous enough to consume more than a small proportion of the Government provision of grain. There will, therefore, be a good deal of grain available for sale for those who can buy in parts where private trade does not supply the markets, over and above what may be required for charitable distribution. Some of the grain will, perhaps, be left unsold at the end of the famine, if happily Behar and Bengal have a good summer crop. Reckoning on a fair summer crop, Government may, perhaps, estimate the proceeds from sale of grain, and from the yield of surplus stores at the end of the famine, to approach a crore.”

57. *Conditions further relaxed.*—In the end of January Mr. Robinson again brought forward his proposal to sell Government grain in Dinajpur to the public.⁶ He argued that with the prices then current at Calcutta, it could not pay any trader to bring up grain to sell in Dinajpur at 10 seers per rupee; especially as no habit of importing exists and “trade connexions are not formed in a month or two.” “There is some money in the country, and very little grain; if the people can get rice within a reasonable distance at a fair price, they will go and buy it and take it themselves to their home (or to neighbouring markets if petty dealers) and so supply places difficult of access. If Government does not do this, it may have to feed at least 70 or 80 per cent. of the population, whereas if rice is sold, I firmly believe that 50 or 60 per cent. would provide for themselves.” He urged that as an experiment Government should allow one Relief Committee to sell 10,000 maunds in February at the rate of 10 seers per rupee, selling not more than 50 maunds, and not less than one bag to any one person. In reply to this, the Government of Bengal on the 18th February

¹ B. B. I., 151.² *Ib.* I., 160.³ *Ib.* I., 155.⁴ *Ib.* I., 235.⁵ *Ib.* I., 165.⁶ *Ib.* I., 244-250.

(with the sanction of the Supreme Government) permitted the sale of grain wholesale (leaving it to the people themselves to distribute it retail) as an exceptional case under two conditions: (1.) That Government has large enough stores to do this without stinting its relief-works and poor-houses; (2.) That there is an absolute dearth of grain in the country, and a want of trade at the chief marts, but a sufficiency of local trade and local activity to distribute the supplies sold by Government. Care must, however, be taken that the food grain does not fall into the hands of monopolists who will hoard it up for their own profit. The quantities thus sold may vary from 20 seers to 10 or 20 maunds as a rule. The difference between these sales and those sanctioned by the rules of Relief Committees would be that in this case the sales would take place at large central marts, in the other, the grain sold has been brought by Government close to the people's doors as a provision for a relief circle of very moderate area.

58. *Sales made general.*—In March¹ authority was given to sell grain to the public in specified parts of east and north-east Tirhut, in north-west Champaran, in north Bhagalpur, and in parts of Purneah, Dinajpur, and Rungpur, at the rate of 10 seers per rupee, subsequently lowered to 12 seers in April.² But during all April less than 10,000 tons were sold.³ Private persons were allowed to purchase direct from the Government granaries; but generally⁴ grain was sold to dealers for retail distribution to the public, and when sold wholesale the rate was slightly reduced. In May the area in which such sale was permitted comprised nearly the whole of the districts named above, as well as Malda and Bogra; besides smaller parts of the other "partly distressed" districts. "It was never authorized in south Tirhut, Shahabad,⁵ Bardwan, Birbhum, Hazaribagh, Patna, or in some parts of Saran, Purneah, Dinajpur and Rangpur. On the whole, it was authorized in about one-third of the area of the distressed districts, not in the remaining two-thirds. Up to June 10th, the sales to the public amounted to 47,389 tons."⁶

59. *Amount sold.*—The quantity of grain sold after this date is as follows:—⁷

					Tons.
Sold up to 10th July	-	-	-	-	74,836
" " August	-	-	-	-	95,858
" " September	-	-	-	-	116,941
" " 1st October	-	-	-	-	118,107

This accounts for grain sold to the public or to labourers, and does not include grain given to labourers in lieu of wages. In August and September the prices were lowered to 13 and 14 seers per rupee, and the final sales must have been at lower rates than these.⁸ The price obtained by these sales is stated⁹ to have been 95 lakhs of rupees or Rs. 80·8 per ton, or 13 $\frac{9}{10}$ seers per rupee.

PRIVATE TRADE.

60. *Extent of its activity.*—The degree of activity of private trade inland (*i.e.*, at a distance from the railway) is somewhat disputed, as has been seen by the conflicting quotations given above; but there is no question that it was extremely brisk along the line of the Railway. At one time, 50,000 tons a month were being brought in from the North-Western Provinces alone to Patna, and the following is Sir R. Temple's estimate¹⁰ of the total imports from October 1873 to October 1874:—

				Tons.
By Railway—				
From Bengal upward to Behar	-	-	-	157,226
From Northern and Central India to Behar ¹¹	-	-	-	225,952
By River—				
From Bengal to Behar	-	-	-	44,886
By River and Road—				
From Eastern Bengal into Northern Bengal	-	-	-	101,000
Total	-	-	-	<u>529,064</u>

¹ B. B. II., 84. (T.)

² It was reckoned that the grain as delivered in local granaries cost nearly 8 $\frac{1}{2}$ seers per rupee or 8 seers of clean grain.

³ *Id.* II., 84. (T.)

⁴ *Id.* II., 96. (T.)

⁵ It was however sold in the District to the extent of three-fourths of the import. (MacD. p. 38.)

⁶ *Id.* II., 97. (T.)

⁷ *Id.* II., 106. (T.)

⁸ Mr. Kirkwood states that in Bhagalpur in July the price of Burma rice was lowered to 16 seers per rupee for the public generally, and 20 seers per rupee for the traders.

⁹ B. B. II., 110. (T.) But Colonel Burn, Manager of the Darbhanga Estate, sold at Rs. 98 per ton to his ryots.

¹⁰ *Id.* II., 97. (T.)

¹¹ This was afterwards calculated to have amounted to 289,000 tons. See Resolution of 18th February 1875 (II., 64).

So rapidly were these stores disposed of and dispersed that when the Commissioner of Patna made enquiries with the view of purchasing locally for Government in that market, he found very little stock in hand, and was convinced that any intervention of the kind would greatly affect and paralyse the trade.¹

"This large total shows that private trade has been active beyond the anticipations of most people, and has fully justified the confidence placed by the Government of India at the beginning of the affair in the resources and enterprise of private dealers. It has been already explained that prices were everywhere so high that private traders could not afford to carry grain by long land journey to markets far from the railways or great rivers; and that consequently private importation scarcely penetrated to the most remote and distressed parts of North Behar and Northern Bengal. But the private importation, as just shown, fully supplied the broad and densely-peopled tract near the railways, and left the Government free to concentrate its supplies and resources mainly on the most distressed tracts."

It can hardly be questioned, after a consideration of these facts, that there was no necessity for importing Government grain into the districts which lie on the Railway, such as Shahabad, Monghyr, Bhagalpur, Bardwan, &c., and there are many others off the line in which trade was active. In Saran the traffic registration shows an import of 65,000 tons, and in March it was officially reported that the bazaars were abundantly supplied with grain; in Champaran private trade was active throughout, as the District lies, for its whole length, along the bank of the Gandak, a stream navigable at all times of the year: even into Darbhanga, according to Mr. Mac Donnell's estimate, 30,000 tons were imported by merchants. Purneah has already been mentioned. And while it is conceded that in the extreme north of Behar trade did very little or nothing towards importing grain it must be remembered that it could not have done this if it had been ever so actively inclined, since Government had taken up all the transport of the country.

In his final minute Sir R. Temple speaks² thus of the cessation of private trade in North Behar—

"During all May and the first week of June there was hardly any rice and very little food-grain of other kinds in the markets of the interior of North Behar and North Bengal. In these tracts the petty retail dealers found their occupation gone, and were glad to act as agents for the distribution of Government rice by sale among the people. The strange spectacle was presented of a whole class of native traders being converted into a Government agency.

"When the rains set in after the first week of June some private stocks were brought out. Of these, a part belonged to individual zemindars and others, and was used for the payment of wages of agricultural labour; a part belonged to traders and was sold in the market. Such sales were, however, comparatively insignificant. After a time they ceased. The markets became quite empty again, and remained so until the new grain of the August and September crops came in."

RELIEF-WORKS.

61. *Rates of wages.*—In the early part of the famine administration the relief-works were carried on on the system of paying daily wages and exacting a sufficient task in return, and the rule was that the ordinary rate of wages should be paid. At this rate an adult male labourer received 2½ to 3 annas a day in Rangpur, and from 1½ to 1½ annas in Champaran.³ In Dinajpur⁴ it was 2½ annas for men, and 2 to 1½ and 1 anna for boys. In February the Central Relief Committee⁵ made a representation to the effect that wages ought not to be fixed at too attractive a rate, and should bear a close relation to the price at which food could be bought. Sir G. Campbell agreed that relief wages should never suffice for more than a mere maintenance, and should have reference to the price of food. But no definite rule could be laid down till it was ascertained whether it was the habit of the district for women and children to work; and when food was extraordinarily dear near any relief-works, wages should not be raised to an exorbitant rate, to enable labourers to buy, but food should be supplied at reasonable rates. It does not appear, however, that any fixed scale of relief wages or any sliding scale following the movement of prices was laid down by the Government of Bengal either for any district or for the whole famine tract.

62. *Women at work.*—The question whether it was the habit for women to work on the roads in Behar was settled by Sir G. Campbell's visit in March.⁶ He passed through crowds of tens of thousands of women employed on relief-works without a complaint being made on the score of caste. He considered it indeed a proof of hard times that these women came to the works, but saw no symptoms that want had driven the better classes to great extremities.

¹ B. B. II., 97, 98. (T.)

² *Ib.* II., 106. (T.)

³ *Ib.* I., 101.

⁴ *Ib.* I., 186.

⁵ *Ib.* I., 257-8.

⁶ B. B. I., 304 (March 15th). This was written in reference to a sensational telegram to an English newspaper about "hundreds of high-caste women to be seen labouring in the Government relief-works."

63. *Classification of workers.*—In his minute of March 28th, Sir G. Campbell remarked¹ that the in-rush of large numbers had been such that the local organization was unable to prevent great abuses. "Women and children came on the works quite as readily as men, and it is because the whole family work or pretend to work that somewhat low wages" with dear food are not incompatible with an almost liberal measure of relief, measured by the fare to which the people are accustomed." But it was essential to put an end to this demoralizing state of things, for "when under pressure of such a necessity" a lax system is established, and every one down to the smallest child gets paid for the "merest pretence of work (with probably a good many abuses besides), the thing becomes too attractive; the whole country tends to come on the works; the numbers threaten to be absolutely overwhelming." His system was to divide the works into two classes, the one under Public Works Department or other competent officers, on which real labour is exacted and full wages paid, the other under circle officers, where the labour is less effective and the rates of wages are mere subsistence rates, or else easy piece work is given for liberal terms. *Primi facie*, daily payments are best, but with such large numbers either payments must be made only to heads of gangs, which opens a field for cheating, or else, which is better, the labourers should be paid every second or third day.

64. *Relation of Public Works Department with Civil Department.*—With regard to the responsibility of the management of large relief-works, he says²—

"It is to be thoroughly understood that not only are the officers of the Public Works Department employed in districts where scarcity prevails, wholly and absolutely under the Commissioners and superior Civil officers of Districts on all points in which they may think it desirable to interfere, but that everywhere the local sub-divisional officers and their assistants are directly responsible to see that payments are properly made and work given in the manner most conducive to relief * * * The Public Works officers will ordinarily arrange for payment of the men employed under them, but the local Civil officers will inspect the works, test the payments of the Public Works subordinates, and see that all is right. If not right, they will at once communicate with the Public Works officers, and if necessary with their own official superiors."

The following is an instance of the vigorous measures taken to ensure that the Public Works Department officers should learn the difference between the system to be pursued on relief-works and that of ordinary years. The Executive Engineer of Tirhut having made no provision for frequent payments, and it being shown that on some of his works the coolies had received no wages for fifteen days, he was severely censured and removed from his appointment.¹

"The Lieutenant-Governor is of opinion that the maladministration in this matter was most serious, for he thinks that it is to the delay in making the works acceptable, popular, and sufficient as relief-works, that the fact of the famine having gained on us in Tirhoot is mainly due. It is clear that sufficient work was not offered on sufficiently attractive terms, in proportion to the prevailing distress during the early stages of the scarcity in that district. Considering the very decided and clear terms of the orders issued by the Government on the 29th October 1873 and subsequently, both by the Government and by the Commissioner, the Lieutenant-Governor cannot but regard Mr. Urquhart's conduct as wholly inexcusable."

65. *Task enforced.*—Regarding the means to be adopted to make the labourers turn out a fair amount of work, he wrote :—³

"To the distressed poor of both sexes the task-work system" (which term as is shown by comparison with other passages is here used to mean the same thing as the piece-work system) "cannot be generally applied. As much work must be obtained for them as they can fairly do, and no more. Any stringent enforcement of a labour test may repel these people and cause ultimate danger to life. But it is better to obtain a little, even the smallest amount of work, from those who can work, than to give gratuitous relief. The offering of piece work is very good whenever the people will accept it, the terms offered being, as has been said, liberal."

66. *Rates relaxed.*—The effect of this attempt to introduce discipline and to obtain a fair return for wages was at first very discouraging. Writing on the 1st May, the Government of India report⁴:—"The local officers received instructions to divide the relief-works into two classes, one for the able-bodied, where real labour by piece-work would be exacted and full wages paid, the other for less effective labour, or easy piece-work, requiring no professional supervision, and remunerated by mere subsistence rates." On this system being suddenly introduced, about 350,000⁵ labourers left the works in one day. A few came back immediately afterwards: a large number were drafted to village works under the circle officers; many who were not fit for any save nominal work were admitted to the lists of charitable relief. But still Sir R. Temple found⁶ that "numbers, estimated at 80,000 to 100,000, had remained out of employ for

¹ B. B. I, 326.

² Low as they were, they left a margin for charity, since Sir G. Campbell saw two or three Fakirs living on the charity of a relief gang.

³ Ib. I, 328.

⁴ Ib. I, 347.

⁵ Ib. I, 329.

⁶ Ib. I, 372.

⁷ Ib. II, 94. (T.)

⁸ Ib. III, 155.

"several days, subsisting on the little savings from their earnings on the daily wage system, but verging nearer and nearer towards the extremity of destitution." Hence, though the terms proposed had not been really hard, Sir R. Temple immediately offered "new terms, much more liberal, indeed as liberal as could properly be offered"; and these speedily attracted large numbers back to the works. What the rates of payment were which were offered in the first case and afterwards relaxed is nowhere stated; but in the next fortnightly report (1st to the 4th May) Mr. Metcalfe gives the following description² of the system.

"On every tank labourers have been given distinctly to understand that they were at perfect liberty to work either at task-work or at daily labour. The allowance for daily labour has been so proportioned that it is just sufficient to subsist on with some degree of comfort. On the other hand, the reward for task-work has been extremely liberal: this holds out an inducement to those who are willing to work and able to work, to earn a fair day's pay for a fair day's work. It has always been possible for a man to make his four annas a day at task-work. This, with rice at one kutchra seer for the anna, is very high pay indeed for one who is not a professional coolie. The consequence of this system is that those who are weak and unable to do much work find such light work to do on the tank as they are capable of doing, and for this daily labour obtain enough food to last for the day. On the other hand, all the able-bodied men take piece-work, and are the real effective coolies on the tank."

67. *The piece-work system.*—In the next report³ Sir R. Temple enters fully into the subject of these rates: at this time (the end of May) there were 1,450,000 people on the works, of whom not more than 180,000 were on daily wage, the rest being on piece-work or task-work. The daily wages given are $1\frac{1}{2}$ annas⁴ in Tirlhut, and $2\frac{1}{2}$ annas in the eastern districts for men: which is only enough to afford "a meagre and jejune subsistence." On task-work "the wages are kept low, hardly higher than the daily wages above described, and as a day's work is exacted, these people are working for what is a stinted subsistence relatively to the high prices of the day. For the piece-work the rates now allowed do appear more liberal for the skilled and industrious, especially in Eastern Tirlhut where the last rate is from 5 to 6 annas⁵ per 100 cubic feet. But they were framed in order to suit those large numbers who, originally of a poor physique, had been recently lowered in condition. The pressure so to speak had to be regulated according to the weakest part of the beam."⁶ "Being anxious, however, that the State charity should be administered with as much thrift as possible," he had authorised the lowering of the rate to 5 annas, and in some cases to $4\frac{1}{2}$ annas, per 100 cubic feet. It was admitted that with these rates the strong and skilled would make more than a subsistence, but this surplus is being saved up against the time between the closing of the works, due to the rains, and the ripening of the crop. "Those who save at the present time will not come on our hands when the works are closed." Some people also⁷ took advantage of these high rates for piece-work to earn enough for their support in a few hours, and to spend the rest of the day working on their fields. This however could not be helped.

"The piece-work system was seen to be open to one particular objection, in that a practised or professional workman earns more than need be allowed to him as relief. Any terms which are favourable enough for the unskilled or inefficient (who are the great majority) must prove too favourable for the skilled few. It was decided that this objection could not be obviated, and that no exception could be made as against those individuals, especially as their example instructed the mass of the relief-labourers in workmanlike habits."

68. *Effect of small local works.*—The spread of local relief-work all over the country had the usual effect of keeping down the numbers employed on the really useful Public Works which Government was anxious to push on.⁸

"The Gunduk embankment indeed, being very favourably situated in respect to distressed tracts, did attract almost as many labourers as could be advantageously entertained—45,000. But the Soane Canal and the Northern Bengal Railway never received the desired complement. The highest numbers of labourers on these works may be thus stated:—

Soane Canal	-	-	-	-	-	41,000
Northern Bengal Railway	-	-	-	-	-	22,000

Unsuccessful attempts were made to induce bodies of labourers from Sarun to resort to the Soane Canal, and from the south of the Ganges, Monghyr, and Sonthalia to the Northern Bengal State Railway. Frequent injunctions were sent to the local authorities to send labourers to that railway, but without

¹ B. B. III, 156.

² *Ib.* III, 164.

³ *Ib.* III, 177.

⁴ The Deputy Collector of Muzaffarpur (Munshi Ishri Pershad) says in his reply to the Famine Commission that on his works in that district two annas were paid to men.

⁵ Mr. Kirkwood (Reply to Famine Commission) says that in the north of Bhagalpur the rate in May was six seers of rice (equal to eight annas) per 100 cubic feet.

⁶ *Ib.* III, 178.

⁷ *Ib.* II, 94. (T.) Some, however, spent their leisure less profitably, doing nothing at home; and they explained to Mr. Oldham (Relief Officer in Champaran) that "they did not care to work every day."

⁸ *Ib.* II, 95. (T.)

much result. These numbers would have been greater had there been no other relief-work. Some men who might have been induced to leave their homes and go to a distance for these great works preferred lesser works close at hand. But this objection cannot be evaded, when, from general famine, it has become necessary to spread a relief system over the country. The majority of relief labourers cannot migrate to a distance for a short time; they have their families, their fields, and their concerns at home, all of which will in a very few weeks urgently need their presence. Their time would be lost in going and coming, and unless they receive bounties (which are otherwise objectionable) they could not subsist. For them, therefore, if no works but the great engineering works are open, there will be no relief at all, and they must perish. But if the numerous lesser works are open for them (and they are the vast majority), it is impossible for Government to prevent the few who could migrate from taking advantage of the works near at home. Nor is this wholly disadvantageous. For these are the very men who, having skill, shew the unskilled multitudes how to work, and thus render the relief labour more productive."

69. *Minor relief-works; the duty of landowners.*—With regard to minor relief-works of local and restricted utility, the following was Sir G. Campbell's opinion¹ at the outset of the famine:—

"There has been much complaint of the want of good tanks for drinking water, of petty drainage channels, and such like improvements. There can be no doubt that petty works of this kind are at least as useful as large works, and they certainly bring employment more effectually to the homes of the people. But, on the other hand, it would be impossible for Government to undertake and superintend such works of local improvement on private property. The Lieutenant-Governor has, however, instructed the Commissioner to ascertain whether it might be arranged that private landholders should undertake such works, Government if necessary advancing the money on the security of the estates. He feels sure that if the upper classes feel the duties of their position such an arrangement should be gladly accepted by them, and be very feasible."

70. *Conditions on which Government may assist them.*—It was soon found, however, that the zemindars would not be willing to pay for such improvements as these, even though the money was lent them, and the next relaxation was to promise² that "Government would be ready to defray a portion, not more than one-third, of the cost of petty village works executed with Government loans before the end of July 1874, which directly improve the drinking-water supply of the people, or are shown to be of direct advantage to the general public." Advances also³ were to be given for digging wells, (1) to zemindars on the security of their estates, (2) to ryots on the security of zemindars, (3) to ryots on their own security, (4) to ryots on no security at all, "provided the need is very urgent, and the ryots from the character and position they hold in the village can be presumed to be men who will honestly repay the money to the best of their ability."

71. *Conditions under which Government may undertake them altogether.*—To some extent these loans and promises of assistance were taken advantage of by zemindars and others, but the question remained whether, failing this, it was right for Government to expend public money on works situated on, and which would more or less improve, permanently settled estates. The Commissioner of Bhagalpur raised this point, on the 18th January⁴ (at a time when in all his Division he had less than 15,000 labourers to employ) by writing "we cannot provide a sufficient number of embanked roads which can usefully be undertaken. There are plenty of excellent and useful tanks, which will do much good and will bring the work near to the homes of the people; but there is little hope of our getting the zemindars to undertake a sufficiency of these works, either from advances or otherwise." On this Sir G. Campbell wrote that though this was the zemindars' duty, and they ought to be persuaded to fulfil it, still there was risk that "while the work of persuasion was going on, the relief-work may fall short, and the people be left without work and without wages." It was possible to pass a law making the zemindar liable for a part of such expenditure, but that would take time. On the whole his view was⁵ that—

"In some cases when proper public works cannot be found, either the Government or the relief committees must undertake works, which are not public works in the ordinary acceptance of the term, in order to give employment to the people and save the cattle. Unless Government is prepared to legislate, we must confine ourselves to those works which seem most beneficial to the people, and make the best bargain we can with the landholders in each case. In such circumstances Government might undertake works of a large and heavy description or very emergently required to save the country, while petty village works necessary for relief might be undertaken by the relief committees."

To this proposal the Government of India assented (9th February).

72. *Conditions further relaxed.*—On the 28th March, Sir G. Campbell, after his visit to Durbhanga, wrote thus⁶ regarding the carrying on of these works—

Para. 19. The village works under circle officers must necessarily be conducted, for the most part, by non-professional people; but I have arranged that in each relief circle an officer should be specially

¹ B. B. I, 6 (Nov. 3rd).

² *Ib.* I, 54 (Nov. 17th).

³ *Ib.* I, 81 (Nov. 1st).

⁴ *Ib.* I, 242.

⁵ *Ib.* I, 243.

⁶ *Ib.* I, 328.

charged to look after the works in the circle. There has been much correspondence regarding these village works. The result is that, by aiding zemindars and otherwise, we must promote the employment of the people to the very utmost, but that in the last resort in very distressed tracts, where the people are likely to starve and no one can be induced to undertake works for his own benefit or from public spirit, the Government must employ the people by undertaking such works (excavating tanks and the like) as are most beneficial to the general community. I rely much on the tact and energy of the local officers to make these arrangements for the best. Even when Government pays for the works, they may advantageously be placed under the village headmen and others locally interested; we want to give the people work near their homes, and, if the headmen are interested, they will carry the work out all the more readily."

These works however were not popular :—

Para. 23.—"In many places the labourers dislike tank work and insist on flocking to the roads. We must reduce them to order and discipline, and make them do the work most fitting for them to do; but still it is a great object to maintain large works sufficient for the employment of all the labourers who legitimately seek work and submit to regular discipline, while at the same time the opportunity of permanently benefiting the country should not be neglected."

73. *Numbers on large and small works.*—The respective numbers employed on large and on small works are not given in all the returns; but the following statistics have been collected regarding them from the fortnightly narratives :—

Periods of time.	Total No. employed.	No. on Village works.
April 17th to 30th - -	1,238,092	616,162
May 1st to 14th - -	1,373,401	699,495
May 29th to June 11th - -	1,737,768	870,846
June 12th to 25th - -	1,770,732	1,010,648
June 26th to July 9th - -	893,163	404,290
July 10th to 23rd - -	636,762	256,374
July 24th to August 6th - -	453,486	214,718
August 7th to 20th - -	426,738	230,167
August 21st to September 3rd - -	395,403	199,170
September 4th to 17th - -	331,982	121,912

In the Patna Division about half to two-thirds of the relief labourers were employed in the village works; in the Rajshahai Division about three-quarters were so employed, in the Bhagalpur Division about half, and in the Bardwan Division a very small proportion.

74. *Total numbers employed monthly.*—The following statement shows as far as it can be ascertained the average monthly numbers employed on relief-works. The appended statement gives the same information in detail for each district¹ :—

November 1873 - - -	5,281
December " - - -	49,051
January 1874 - - -	113,224
February " - - -	284,690
March " - - -	674,074
April " - - -	1,295,816
May " - - -	1,694,142
June ² " - - -	1,198,908
July " - - -	632,259
August " - - -	426,077
September " - - -	242,079
Total - - -	6,615,601

Looking only at the time of greatest pressure, the average number employed daily during the nine months from January to September was 735,067.

¹ The figures for the districts are taken from Mr. MacDonnell's report, those for the three large Public Works Department works from the special narratives: but Mr. MacDonnell's figures are not quite complete, the numbers employed in the Patna District, for instance, not being given.

² The sudden fall in this month is very remarkable, and does not agree with the figures given in the preceding paragraph according to which the numbers went on increasing till June 25th, and only began to fall at the end of the month.

STATEMENT OF THE NUMBER OF PEOPLE RELIEVED ON WORKS IN BENGAL DURING THE FAMINE OF 1873-74.

133

Districts.	November, 1873.	December.	January, 1874.	February.	March.	April.	May.	June.	July.	August.	September.	Total number relieved.	Average monthly number.	Average cost per head per mensem.	Grain wages.	Cash wages.
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17
Shahabad -	950	2,286	2,227	2,582	3,033	6,290	10,074	6,454	4,407	4,403	2,996	45,792	4,163	Rs. A. P. 5 11 10	Tons. 545	1,80,373
Saran -	-	-	20,180	87,181	106,850	166,683	197,442	223,991	140,765	110,262	101,111	1,154,465	128,274	2 10 2	11,487	15,06,412
Darbhanga -	-	-	2,500	45,000	251,402	531,578	569,402	279,943	77,615	66,408	21,682	1,845,530	205,059	2 8 3	10,769	31,88,829
Muzaffarpur -	-	851	973	13,692	64,841	177,238	327,348	269,177	128,778	102,183	39,654	1,124,635	112,463	2 1 10	9,500	11,00,685
Chunpurnan -	561	4,589	11,631	26,361	52,758	83,917	159,668	79,752	73,007	8,938	1,849	502,031	45,639	3 3 10	7,294	6,43,808
Gya -	-	-	142	454	764	1,334	2,486	2,756	1,192	397	383	9,908	1,101	5 11 1	117	40,648
Bhagalpur -	1,851	4,106	7,485	3,639	7,956	22,234	32,637	27,528	29,556	29,424	12,002	177,978	16,180	2 2 6	1,474	1,85,498
Monghyr -	-	4,210	5,227	4,240	4,460	4,631	10,596	11,148	3,012	1,972	332	50,728	5,073	3 14 7	486	1,32,593
Saundhal Parganas -	-	-	400	540	2,575	12,490	21,383	27,039	18,226	11,811	6,130	103,594	11,510	4 4 10	1,970	1,79,359
Purneah -	-	356	945	3,640	10,231	20,264	31,029	28,763	21,746	9,626	1,014	127,614	12,761	7 6 1	5,366	2,17,584
Dhulapoor -	1,800	6,055	21,179	29,696	60,516	93,208	94,797	53,259	25,742	8,653	2,543	397,448	36,132	3 14 8	2,934	11,61,492
Rungpur -	-	59	722	1,705	8,988	31,696	53,308	22,747	5,830	93	7	125,155	12,515	4 0 6	922	4,50,909
Muldah -	-	426	260	1,816	3,366	5,154	7,374	5,442	3,650	2,441	762	30,691	3,069	4 8 9	243	1,06,762
Murshidabad -	-	737	1,892	2,898	2,894	3,134	3,103	3,347	2,765	6,171	1,967	28,288	2,829	5 14 0	707	70,795
Rajshahi -	619	713	557	451	3,316	2,971	2,162	1,914	979	878	395	14,955	1,359	5 5 8	209	51,841
Bogra -	-	45	587	1,566	8,000	29,285	45,454	17,521	8,060	-	-	110,518	12,815	3 9 5	813	2,58,111
Pabna -	-	111	229	621	1,635	863	2,598	2,214	1,118	252	40	9,681	968	3 11 5	100	22,456
Birbhum -	-	-	-	652	2,107	3,846	8,054	10,352	6,655	7,856	5,194	44,656	5,586	4 7 8	1,004	64,809
Bankura -	-	-	-	-	2,291	1,890	2,639	3,492	3,651	4,103	3,302	21,368	3,063	9 9 0	797	96,850
Bardwan -	-	-	1,168	3,513	3,369	6,430	9,613	11,574	7,571	5,252	2,906	50,686	5,632	5 3 4	1,495	62,277
Nautilya -	-	-	-	1,662	2,409	1,850	2,348	4,054	5,006	4,848	2,037	24,214	3,027	8 0 11	478	1,30,712
Manbhum -	-	-	-	1,371	3,215	10,002	13,917	14,259	8,211	794	127	51,896	6,487	6 1 6	1,691	88,122
Total	5,281	24,604	78,304	231,720	606,906	1,216,988	1,610,332	1,106,726	578,442	386,825	205,733	6,051,861	635,695	2 15 10	60,401	99,50,925
Soune Canal -	-	1,28,475	33,000	34,000	30,439	36,358	41,019	33,397	27,441	26,472	2,60,020	310,621	31,062	-	-	-
Gandak -	-	1,972	1,620	14,370	27,224	27,024	23,964	36,410	15,450	7,386	2,5942	160,302	16,036	-	-	-
Northern Bengal Railway -	-	-	1,800	4,600	9,505	15,445	19,827	22,375	10,926	5,394	2,4,384	92,757	10,306	-	-	-
Total	-	1,24,447	34,920	52,970	67,168	78,828	83,810	92,182	53,817	39,252	2,36,346	563,740	57,404	-	-	-
Grand Total	5,281	49,051	113,224	284,690	674,074	1,295,816	1,694,142	1,198,908	632,259	426,077	242,079	6,615,601	693,099	-	60,401	1,28,40,000

¹ From 13th December only.

² First fortnight only; all strictly relief-works closed.

75. *Cost of relief-works*.—Up to the middle of April the labourers were generally paid in cash, and 31 lakhs of rupees were disbursed in wages¹ before the 15th of that month. After that date the system of paying in grain was introduced, either by issuing food grain, or establishing a shop close to the works and paying the labourers in money, and leaving them to buy grain at the shop or at the nearest Government granary. The total cost was reckoned by Sir R. Temple as Rs. 1,28,40,000 in cash and Rs. 46,90,000 in grain; but this sum apparently is got by taking the ton of grain as worth about Rs. 75. Taking it at Rs. 135, the cost of the 60,401 tons disbursed as wages (see column 16 of preceding statement) in certain districts alone was Rs. 81,54,000. There was besides the value of the grain disbursed on the great Public Works, which is not recorded. Putting this aside, the total cost of relief-works was Rs. 2,10,00,000, and the average payment per head per month Rs. 2-15-10, or say Rs. 3. But in several districts it exceeded Rs. 5, and in Purnea it was as high as Rs. 7-6 per head. Of the expenditure, 37 per cent., or about Rs. 77,00,000, was expended on tanks, and 63 per cent., or Rs. 1,33,00,000, on roads of which the value (at the labour rates of ordinary years) was estimated as Rs. 55,00,000.

76. *Result of works carried out*.—The result² of the relief-works was that in the country north of the Ganges about 4,000 miles of old and new roads had been set in order or made, and besides these about 2,600 miles of road had been made or repaired in the Bhagalpur, Rajshahai, and Bardwan Divisions, making 6,600 miles altogether. It was estimated that an expenditure of about 14 lakhs more was required to bridge these roads, and put them in working order.

PRINCIPLES OF ADMINISTERING GRATUITOUS RELIEF.

77. *Earliest views as to tests*.—The earliest views expressed on the subject of administering gratuitous relief were in accordance with those which had been followed in previous famines. In his letter of January 10th,³ instructing district officers that the time had come to make definite arrangements for the constitution of Relief Committees and for setting them to work, Sir G. Campbell said: "Everywhere care will be taken that relief is not given without work, when work is possible, being exacted as a test of necessity; but it must at the same time be remembered that there are classes of men, women, and children who cannot work on the roads; many of them too are in remote villages and out-of-the-way places; they will sometimes die without complaint rather than come to relief-houses and make their wants known." The members of Committees must be trusted to find out these people, "to judge of their real wants and reasonable prejudices, and to do what is possible to combine economy of means with efficient relief."

78. *Duties of the Relief Committee*.—On the 13th February, the Government of India declared its views⁴ as to the field which the Central Relief Committee ought to occupy, and the manner in which gratuitous relief should be administered. "The whole force of the administrative machinery of Government must be directed to the transport and distribution of food. The responsibility of ensuring a supply of food to those who cannot obtain it by other means must rest with the Commissioner of the division and the local officers." The functions of the Central Committee, as far as regarded such tracts as North Behar, should be "confined therefore to collecting subscriptions, and arranging for the supply of money or food to the District committees," to which the management of all details should be left, the Central Committee interfering as little as possible; they would of course not purchase grain except from the Government stores.

79. *Abolition of tests*.—The Viceroy then went on, in a most important passage, to declare the views of the Supreme Government as to the distribution of gratuitous relief, the abolition of any system of tests, and the preferability of placing reliance on the personal local knowledge of the distributor.

PARA. 7.—"Where distress arises from a general deficiency of the food-supply of a large area of country, which deficiency cannot be met by private traders, stringent labour tests are not applicable. The labour test was tried during the earlier portion of the Irish famine; it failed, and ultimately gratuitous distribution of cooked food was substituted. It was under the latter system, coupled with the sale of grain at market rates by Government where private traders could not supply it, that the Irish famine was at last successfully dealt with. The circumstances in India are not entirely similar, but it appears to His Excellency that where they differ, the difference would point to an extension of the system of gratuitous distribution of food, and especially to the establishment of a system of advancing

¹ B. B. II, 84. (T.)

² *Id.* II, 105. (T.)

³ *Id.* I, 171.

⁴ *Id.* I, 239.

supplies of food to cultivators. When distress extends to whole classes of the population, His Excellency relies upon the local knowledge of the persons entrusted with the distribution of relief to prevent abuses.

PARA. 8.—“This subject is one of great importance. The provision of employment for the labouring population upon public works was directed, and in His Excellency’s opinion properly directed, at the outset of the period of scarcity as a preliminary and precautionary measure, so that the means of providing themselves with subsistence might be afforded to the labouring population, and to the smaller cultivators who were not altogether unaccustomed to labour for hire. This application of public works has been proved to be sound by the experience of former periods of scarcity in India, but any system of relief by public works becomes impracticable when applied to a very large proportion of the population of a country. In order to apply it under those circumstances, unprofitable work must be found simply as a test by which to prove that the persons applying for relief are proper objects upon which to bestow it. Any application of such a test upon the scale that would be necessary in dealing with North Tihoot would in His Excellency’s opinion inevitably break down, and, moreover, by congregating cultivators at centres for the purpose of giving them employment entail not only considerable hardships upon the people, but, as was found to be the case in Orissa, more serious evils.

PARA. 9.—“These observations are by no means intended to imply that wherever useful work can be found, whether of a public or of a private character, advantage should not be taken of it as affording a most valuable aid to the general system of relief, but they have been made for the purpose of preventing the relief committees from considering the universal application of a rigid labour test to be recommended by Government.”

80. *Rules for Relief Committees.*—The rules for the guidance of the sub-divisional and sub-committees were originally issued on the 26th January, but were afterwards slightly amended, and stand thus¹ in their final form :—

Their principal functions were to be :—

- (a) To collect subscriptions, and to distribute the resources which will be at their disposal from local subscriptions, from the contributions of Government, and from the grant received from district committees.
- (b) To distribute for relief purposes grain received from local sources or Government depôts.
- (c) To transport grain to convenient places, and to provide for its proper storage.
- (d) To distribute gratuitous relief to persons in need of it and unable to work.
- (e) To provide useful employment for those people who are in need, and are able to work, by instituting minor relief-works, and providing other employment, such as spinning, weaving, husking rice, &c. Sub-divisional committees will have information of the Government public works in their neighbourhood in order that labourers may be despatched to those works, together with their families if desirable.
- (f) To provide in such manner as may be considered the best, in each particular locality, for the relief of persons whose caste, usages, and feelings preclude the application of a labour test—women of good family and others who may be in great distress. Relief for this class of persons may be afforded either wholly gratuitously or partly gratuitously, by the sale of grain under the market rates, or, with due precautions, by the advance of money or grain to be subsequently repaid.
- (g) If a serious deficiency of grain in any part of their district is apprehended, which the trade is unable to supply, the sub-divisional committee may, under instructions from the collector of the district, make arrangements for the sale of grain from Government stores. The arrangement should, as a rule, be made through the agency of the traders, which will probably be available everywhere. The selling price should be fixed at that of the nearest largo mart, where supplies are readily brought in by railroad or river, together with such addition representing the cost of transport as may be considered proper. Sales should be stopped as soon as the trade receives sufficient supplies, and any competition with the local trade should be carefully avoided. This rule will not interfere with the sale of rice under the market rate as a means of relief under clause (f) to persons whose cases have been inquired into by the committees or their officers.
- (h) The congregation of large masses of people away from their homes for the purpose of relief should be avoided. Every village in which general distress exists should, so far as practicable, be dealt with separately as regards relief-works and the distribution of gratuitous relief. The acceptance of cooked food should not be insisted upon as an invariable test to be applied to all who require relief. In the very distressed districts such a test would generally be inapplicable. It may be necessary to establish poor-houses in some places, such as considerable towns. In those houses food might be distributed, cooked or uncooked, as may be most convenient. Generally speaking, those who are unable from illness to cook their own food should be provided for in hospitals.

81. *Sir G. Campbell advocates the test of cooked food.*—On the 16th February² Sir G. Campbell wrote the following passage in reference to paragraph 7 of the Viceroy’s minute quoted above, to explain what in his view was the province within which tests were useful and applicable. He considered that a note he had written had been misunderstood by the Viceroy :—

“He there intentionally used the expression ‘test’ and not ‘labour test,’ for he has never over-estimated labour tests alone. As a member of the Orissa Famine Commission, and elsewhere, he has, on previous occasions, pointed out how ineffective such tests become when famine has gone beyond a certain point and labour becomes nominal; and while seeking to utilise labour to the utmost, he has never insisted on its usefulness beyond a certain point.”

¹ B. B. I., 289, 290.

² *Id.* I., 274.

PARA. 3.—"At the last conference at Government House, the Lieutenant-Governor submitted to His Excellency the Viceroy, as a question for discussion and instruction, the question now under consideration, as follows:—

"V.—When the numbers to be relieved get beyond ordinary poor-houses and careful individual village relief, is it desirable to insist on labour on Government works in return for full rations or strict poor-house test? or is it better to give up the attempt to exact labour, and simply to give to all who seem to be poor a minimum of the poorest sustenance—gruel cooked by the Brahman according to Sir George Balfour's recipe?"

On the same day he issued a circular forwarding the Government of India's letter of February 13th quoted above, and saying¹—

"As regards paragraphs 7, 8, and 9, it will be understood that it is by no means intended to discourage the system of relief-works which has been hitherto enjoined, or the employment of both the inmates of poor-houses and those receiving outdoor relief in various ways, as contemplated by the instructions. So long as famine does not reach an extreme point the relief-works and other employments will both utilise the available labour, act as a test of real need, and keep the people receiving relief engaged in manner conducive to their well-being. It is only when want becomes so general that it is impossible to employ a whole population, or to obtain any real or adequate work from great numbers employed on nominal work which they do not do, that the instructions of the Government of India become applicable. If such a state of things should unhappily come about the Committee's instruction that gratuitous relief must be given to those for whom work cannot be found will come into play. In that case it may be necessary to give food to all the needy, and the test on which we must chiefly rely must be that on which the Committee has insisted, viz., that, as a rule, the gratuitous relief so given must be in the shape of cooked food. In this country the great mass of the people are little inclined to accept charity in this form, and this alone will be in their case a sufficient test of their needs. It would be impossible to dispense with this test, because if uncooked grain were distributed gratuitously to all who should certainly be called on to support the whole population—a task beyond the means of Government—unless it be under extremely exceptional circumstances in limited tracts. The Committee's rules amply provide for searching out and relieving those who have good social or other grounds for objecting to the form of relief by cooked food, and are yet so poor and helpless as to require gratuitous relief, which in such cases is to be given by assignments of uncooked food."

PARA. 4.—"Again, if famine does not reach the extremest degree of severity, or as soon as it begins in some degree to abate, it is of very great importance that no portion of the population hitherto self-reliant should be allowed to sink into confirmed paupers, and the utmost vigilance must be used to wean such people from dependence on charity, and restore them to self-support. For this purpose, both as a test and as a step towards return to habits of self-reliance, the exaction of labour will be most beneficial, and should in no degree be neglected."

82. *Duties left to Central Relief Committee.*—On the 21st February some instructions were examined which the Central Committee proposed to issue to the Subordinate Relief Committees, and which it was thought might conflict with the orders issued by Government, and place the local officers in a difficult position under two masters. It was decided by Lord Northbrook² that in the very distressed districts (these were declared to be seven in number—Tirhut, Champaran, Saran, Bhagalpur, Purneah, Dinajpur, and Maldah) it was better that Government should take the whole cost of ordinary relief, including the gratuitous distribution of food, into its hands, making no charge against the charitable funds, and in those districts the functions left to the Central Committee were only two—to provide useful employments, such as spinning, weaving, &c., or allowances of money and clothes, for those who neither went to the Government relief-works nor received the Government grain. In other parts they were to carry out the functions entrusted to them by the rules, to pay for the Government grain they distributed at a rate less by 10 per cent. than the wholesale rate ruling in the nearest large mart where there were ample supplies (e.g., for the Patna Division the Patna rates were to rule the price to be paid³), and to employ, appoint, and pay for the relief agency. But on further consideration, even this position was seen to have its inconveniences: the distinction between very distressed and distressed districts was withdrawn,⁴ and it was decided that the Local Relief Committees should be entirely under the orders of the district and sub-divisional officers, and should receive no instructions at all from the Central Committee, whose functions were restricted to the collection and distribution of funds and the receipt of reports.

83. *The test of cooked food repudiated.*—Sir G. Campbell's views about tests, and especially about cooked food, were however too stringent, in the Viceroy's opinion: and on the 6th March, while republishing the amended rules for Relief Committees, he wrote as follows:—⁵

"The Government has not prescribed the invariable use of any test either by labour or by the distribution of cooked food, for the purpose of determining who are fit objects for relief. Such tests are desirable and necessary under certain circumstances. It is right that able-bodied men, accustomed to labour, should, as a general rule, be required to work in return for the food and money supplied to them. It is desirable that light work should be found for others where this can be arranged profitably, and without obliging large numbers of people to leave their homes. In dealing with certain classes of

¹ B. B. I, 275.

² *Id.* I, 286-7.

³ *Id.* I, 281.

Id. I, 290.

⁵ *Id.* I, 292-3.

distress, especially in towns, the issue of relief cooked food may be useful as a test. But stringent tests are inapplicable to those limited tracts of country where, owing to the great failure of the crops and the absence of private trade, the Government have, in accordance with their Resolution of the 7th November last, assumed the task of importing grain for sale and distribution to the people.

"In such tracts the difficulty will be not to prevent undeserving applicants from being relieved, but to ensure that sufficient supplies reach those who require them; and, in addition to the modes of relief and the provision for the sale of grain specified in the instructions to Relief Committees, grain should be freely advanced to zemindars and mahajuns under the instructions already issued by the Government of Bengal, as well as to the cultivating ryot, where there is a reasonable probability of repayment, at the discretion of the local officers, and with due regard to the maintenance of a sufficient reserve."

On receipt of this,¹ Sir G. Campbell cancelled so much of his circular of February 16th as referred to the application of the test of cooked food.

84. *Objections to cooked food.*—After his visit to North Behar, Sir G. Campbell wrote as follows,² regarding the administration of relief, when the test of cooked food was not applied:—

"The only form of gratuitous relief which can be given somewhat indiscriminately, without leading to great abuse and future difficulty, is cooked food. It is clear that the people of Behar will not accept this form of relief in any numbers till they are very much straitened. It is not that the lower orders have much ease—many of them will eat almost anything; but they are curiously timid, afraid that we may ship them off beyond seas and what not, and very averse to altering their habits."

85. *Gratuitous relief given in raw grain.*—In the middle of April³ it was decided that gratuitous relief should be, for the most part, given in grain.

"The issue of rations in grain to the recipient of charitable relief was arranged without difficulty. The grain consisted generally of rice. It was necessary that, together with the rice, some other kind of grain, or some vegetable and condiment, should be taken. To enable these people to purchase the accessories, a small portion, one-sixth, of the ration was given in money. It was not found expedient as a rule to issue cooked food or prepared food, save in a few places. * * * Registers had been prepared of all fit recipients of this relief. The tickets entitling the people named to gratuitous relief had been issued to each person or to each family. Those who were able to do any, even the lightest kind of work—weaving, spinning, or the like—had their tasks allotted. Those who were unable to take any care of themselves were lodged in poor-houses, or placed under medical supervision. There was still, however, some difficulty in searching out all the fit objects of this relief. The superior officers of the circles, on going their rounds in the villages to see whether the registration had been completely done, would find here and there some feeble person not included in the registers. And at each weekly or bi-weekly inspection by the group or sub-circle officials the nominal roll was swelling. In justice to the people it must be said that but little imposture came to light; we had to guard rather against their holding back unduly than against their coming forward improperly. Whether from shyness, or ignorance, resignation, or despair, they often faced mortal danger in a manner which inspired both pity and esteem.

"By degrees those persons who, from caste, delicate nurture, social seclusion, or such like reasons, could neither work nor beg, were added more and more to these lists. In North Behar, the Tirhootia Brahmins form a very numerous class. Some few of them were induced to work for Government wages, by the persuasion of a relief officer who was himself a Brahmin. It is probable that the majority of them would, sooner than work, have drifted into a condition near to starvation. The local authorities deferred relieving these cases as long as possible, but gradually admitted them according as the imperative demands of safety might dictate. The people of this class, however, were, from a natural pride, often unwilling to be regarded as recipients of altogether gratuitous relief, and would endeavour to pay something, however small.

"In the Burdwan Division only was there any reason to take precautions against imposture. There the endemic fever had necessitated the administration of relief, medical or other, during several years past, and some classes had gradually fallen into habits of undue dependence on public charity. Here the issue of cooked food served as an effective check in this division."

86. *Statistics of gratuitous relief.*—The total quantity of grain distributed gratuitously is nowhere stated in Sir R. Temple's closing minute: it can, however, be arrived at in the following manner:—

Total quantity of grain disposed of	-	-	-	Tons.	343,000
Deduct—					
Sold to public	-	-	-	Tons.	118,107
Advanced in loans	-	-	-	-	107,877
Given as wages to labourers	-	-	-	-	60,401
Total	-	-	-	-	286,385
Balance available for gratuitous distribution	-	-	-	-	56,615

¹ B. B. I, 291.

² *Ib.* I, 330.

³ *Ib.* II, 93. (T.)

This agrees fairly well with Mr. MacDonnell's figures, according to which the quantity distributed was 50,058 tons. The cash distributed¹ was Rs. 25,54,000; so that the total cost of gratuitous relief (taking the grain at Rs. 135 per ton) was Rs. 93,12,000. The average number daily relieved during each month in each famine district is shown in the detailed statement which follows (compiled from Mr. MacDonnell's report) of which this is an abstract :—

	No.
January - - - - -	378
February - - - - -	3,708
March - - - - -	24,003
April - - - - -	168,245
May - - - - -	305,052
June - - - - -	508,770
July - - - - -	685,595
August - - - - -	582,361
September - - - - -	318,161
October - - - - -	23,272
November - - - - -	4,118
Total - - - - -	<u>2,623,663</u>

¹ The total cost of charitable relief, according to Sir R. Temple's final Minute, was Rs. 28,00,000. The difference may be due to the cost of establishments and miscellaneous charges.

STATEMENT showing the number of People relieved in BENGAL gratuitously during the FAMINE of 1873-74.

Districts.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	Total Number Relieved.	Average Monthly Number.	Average cost per head per mensem.	Grain distributed in Charitable Relief.	Cash distributed in Charitable Relief.
Shahabad, p. 23	—	—	187	1,387	2,996	935	2,762	2,747	1,501	—	—	12,515	1,788	Rs. A. P. 5 12 5	Tons. 287	Rs. 38,566
Suran (45)	—	—	824	3,590	5,801	4,842	7,450	9,404	3,603	—	—	35,514	5,073	10 8 11	610	292,653
Darbhanga	—	—	—	82,642	130,178	169,260	187,129	173,518	72,654	—	—	816,371	135,895	2 9 5	14,351	1,73,250
Muzaffarpur	—	—	5,550	9,921	16,818	60,655	43,774	39,404	13,407	—	—	189,529	27,075	3 3 3	3,448	1,41,711
Cumnapur	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1,190	36,950
Gya	—	162	238	407	533	1,397	1,813	1,920	1,158	—	—	7,528	953	5 6 6	220	11,522
Bangalpur	—	—	1,486	1,354	12,522	47,580	37,217	37,730	40,382	—	—	187,271	26,753	3 11 9	4,932	1,28,064
Monghyr	70	960	2,630	4,125	3,300	4,284	4,212	3,637	1,902	—	—	24,310	2,701	5 7 2	360	83,865
Saundal Parganas	—	—	—	—	58	1,007	2,072	3,438	2,395	—	—	8,970	1,794	1 13 6	121	234
Purneah	—	—	707	3,844	8,233	16,538	36,180	33,331	3,572	—	—	102,495	14,642	4 5 11	1,897	1,92,000
Dinajpur	—	—	—	9,926	19,500	40,921	83,410	44,363	21,668	—	—	210,788	36,631	2 1 0	2,732	87,653
Raungpur	308	2,303	6,796	16,805	23,600	34,457	24,093	8,150	—	—	—	116,512	14,564	3 1 4	1,517	1,54,975
Maldah	—	283	482	2,209	8,142	11,107	11,853	8,102	3,905	—	—	46,023	5,760	4 6 11	1,315	26,951
Murshidabad	—	—	373	1,700	2,695	7,860	16,159	21,592	11,962	—	—	62,341	8,906	9 8 7	2,642	2,38,000
Rajshahi	—	—	141	2,880	9,050	18,224	46,664	45,283	10,896	—	—	133,038	19,005	2 7 5	2,080	46,998
Bogra	—	—	621	4,100	25,775	19,534	36,250	—	—	—	—	86,280	17,256	4 10 3	2,549	56,440
Jahna	—	—	—	290	275	6,225	8,945	6,526	5,284	—	—	27,546	4,531	0 12 6	70	12,211
Birbhum	—	—	504	2,698	7,638	14,463	22,435	34,858	30,213	—	—	112,809	16,116	2 8 0	1,725	49,456
Bankura	—	—	960	5,182	9,520	19,540	38,148	25,223	11,306	—	—	109,879	16,697	2 1 2	930	1,09,559
Bardwan	—	—	2,414	11,997	11,145	19,090	55,989	65,373	64,098	23,272	4,118	258,496	28,722	5 10 9	6,812	5,46,723
Nadiya	—	—	—	—	—	—	—	—	—	—	—	—	—	—	264	54,000
Manbhum	—	—	—	3,188	7,272	10,861	18,140	17,762	10,065	—	—	67,288	11,215	2 10 10	706	84,867
Total	378	3,708	24,003	168,245	305,052	508,770	685,595	582,361	318,151	23,272	4,118	2,623,663	396,137	3 6 11	50,058	25,54,718

The numbers relieved, however, in Champáran and Nadiya are not known, though the amount spent on them is: assuming that the sum expended fed as many people here as in the average of all other districts, 90,000 people must be added to the total number, raising the figure to 2,713,663.

Looking only at the six months, April to September, during which this relief was mainly given, the average number relieved daily was 452,277, and the average cost per head per mensem was Rs. 3-6-11.

87. *Operations of the Central Relief Committee.*—Of the operations of the Central Relief Committee very little is on record. They received altogether¹ from the public Rs. 28,26,690 (of which Rs. 14,65,000 were contributed in Great Britain), and an equal sum from Government: and they expended altogether Rs. 42,90,000, of which Rs. 27,00,000 was paid on account of grain received from the Government stores. Details of the rest of the expenditure are not given.

ADVANCES TO RYOTS FOR SUBSISTENCE.

88. *Early views on the subject.*—The first form which this mode of relief took was the suggestion by Lord Northbrook,² December 16th, that zemindars would no doubt be glad to support their ryots, and to receive advances from Government for this purpose; but that if they did not show alacrity in doing this, and if it was difficult for cultivators to give security, some legislative enactment might be passed to the effect that their landlord shall stand security for the repayment. On the 3rd February³ the Lieutenant-Governor ruled that it was impossible to wait for legislation at such a time: advances might be given, not to zemindars only, but to inferior and intermediate holders, for the use of their ryots, and that when they would not take them, money might be advanced direct to the cultivators as a loan by the Relief Committees under their rules.

89. *Enlarged application of those views.*—A few days later (February 16th), Sir George Campbell wrote again⁴ that the reports he had received convinced him that in many "Districts, perhaps the most pressing want, and even in the most distressed Districts" "one of the greatest wants, is for advances to tolerably reliable ryots who only want a "little help to tide them over the worst time." Every effort was to be made to urge and encourage the zemindars and holders of landed interests to "sustain their ryots" by advances of grain or money; and special report should be made of those estates in which the zemindars could not or would not do this, and Government would be forced to intervene. The effect of this liberality was what might have been expected. Mr. Hudson reported:—⁵

"It is evident that a rumour has spread abroad that there is a distribution of money on the part of Government; and there is a rush from all quarters to get a share of it without any general understanding on the part of the applicants of the objects of the distribution, and without (in many cases) any necessity for it, or any clearly defined object of their own in seeking it."

District officers were besieged by petitions for loans from small cultivators who each offered to pledge his fields or trees or some such property he claimed a right in: but the zemindars invariably denied the existence of any such right, enquiry at such a time into such a number of cases was impossible, and when it was made it often turned out that the rights claimed were imaginary, or that the applicant was not at all in distressed circumstances. Petty traders also applied largely for advances to enable them to import grain.⁶

"These applicants, before they had learnt the catch-word (so to speak), frequently admitted that their object was to buy up grain in their own immediate neighbourhood, and to sell it again; but when my questions had instructed them a little, they of course professed an intention of importing grain from the great Government depôts—Revelgunge, &c. It is clear that, while this endeavour on the part of decayed tradesmen to obtain a fresh capital was a gross attempt to pervert the benevolence of Government into a means of private gain, to scatter abroad small sums to be employed in the manner first disclosed would only be to raise the price of grain by creating a competition amongst petty dealers to obtain possession of it."

Other ryots again applied for grain advances on the plea that their money-lender had refused to grant them any further supplies, and on enquiry it was found that he had done this for the excellent reason that they had owed him money for long and had paid him nothing during the two preceding good years. Sir George Campbell recognised⁶

¹ B. R. II, 80, 81.(T.)

² *Ib.* I, 98.

³ *Ib.* I, 221.

⁴ *Ib.* I, 276.

⁵ *Ib.* I, 298.

⁶ *Ib.* I, 302.

" the dilemma in which we are placed, namely, on the one hand, the difficulty of affording any really wide and adequate relief, if we insist on sufficient security; and on the other, the way in which the liberality of Government may be and will be abused if we adopt a lax and easy procedure." He could only say that " when it is necessary to save life or to keep the people from sinking into pauperism, the Collector must obtain the best security he can, and advance money to ryots if he considers there is a reasonable certainty of repayment."

90. *Advances given still more liberally.*—After his visit to Darbhanga, Sir G. Campbell was inclined¹ to accept a suggestion that when a ryot by labouring on the relief-works has shown his necessity, wages should be advanced to him for the time he must be absent carrying on his cultivation.

PARA. 42. * * * " If the individualising system is carried out fully, and if we know who our labourers are, where they reside, and where they work, we may be able to say to a poor man when the rains commence—we now know that you are no impostor, but a person willing to work for your bread; we cannot employ you longer; it would ruin the country if we could; here is a couple of months' supply of food; we give you that, take it home, but now you must support yourself; we have done with you. Seeing the amount of grain we are storing, and the scale on which our establishments are now being formed, I think this might be done in some parts of the country." * * *

But in North Behar there was a large class of high caste ryots too proud to work and too poor to carry on efficiently the work of another season without assistance. To give money, nominally as a loan, but really with no hope of ever recovering it, would be demoralizing in the extreme; and the business of opening a great system of direct advances to a vast number of ryots would overwhelm the officers. He therefore strongly urged that advances should be given through zemindars and money-lenders; the main security offered by most borrowers was their silver ornaments; but Government could not open a pawnbroker's shop, while the money-lenders could. Villages should be divided into three classes; those in which the zemindar can assist his ryots, and should by every means be induced to do so; those in which he has not the means but has the will, if he gets advances, to the proper use of which our officers must see; and, thirdly, those in which it is found impossible to work through the zemindars, and Government must undertake the task of saving the people alive. But even here it would be better to make use of the money-lenders to whom the villagers are accustomed to look, and to lend money through him rather than directly. The terms of these advances were that half was to be repaid in March 1875, and the rest in March 1876, the price being fixed at 15 seers per rupee at first, and afterwards lowered to 13 seers per rupee. At the prices of ordinary years² a ryot would have to sell two maunds of grain to repay the price of one maund advanced in 1874, thus the cost to him would be cent. per cent., and yet there would be no gain to Government but a loss equal in amount to his loss, as the grain cost Government $8\frac{1}{2}$ seers per rupee.

91. *Results of the advances.*—On the 7th November 1874 the Government of Bengal reported³ that—

"The advances of grain made to zemindars and ryots under the principle originated in the above-mentioned letter have now amounted to over 29,24,000 maunds (108,000 tons), valued at close upon £700,000. The Lieutenant-Governor believes that these advances have been of the greatest possible benefit to the afflicted districts, for by them nearly half a million families have been supported or helped over the rainy months, while small occupiers of land have been enabled to hire field labourers, and so to secure a crop this season on lands which would not otherwise have been cultivated for want of labour."

92. *Measures for their recovery.*—The question now was how to recover these advances. "The great majority of ryots who took them are ready and willing to repay them by the instalments fixed by Government. But among so great a body of men, there must be some individual recusants who will evade repayment if possible, and the advances were in many districts made with a degree of expedition which may have precluded the fulfilment of all the useful legal formalities." In fact, the bonds were in most cases neither stamped nor registered, and even if they were made legally valid, to sue a recusant ryot in the Civil Court would cause great delay and would ruin him with costs: the amount advanced to each ryot averaged from four to eight maunds of grain (worth from 10 to 20 rupees), and the costs would be out of proportion to the value in suits for instalments of petty sums like these. Accordingly, it was proposed that a law should be passed to make these advances recoverable as an "arrear of demand," a procedure which, though summary, was neither harsh nor expensive, and to this the Government of India agreed.

¹ B. B. I, 336.

² *Id.* II, 96. (T.)
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³ *Id.* II, 56.

93. *Amount advanced.*—The quantities of grain advanced to cultivators were as follows:¹—

	Tons.
Up to the 10th June	14,412
„ 10th July	45,376
„ 10th August	82,935
„ 10th September	102,828
„ 10th October	107,877

It is believed that the recipients of this grain were about 400,000 people.

94. *Value advanced and recovered.*—The value of 108,000 tons of grain at 18 seers per rupee amounts to Rs. 67,20,000. In Sir R. Temple's final minute² it is estimated that Rs. 62,50,000 are likely to be recovered; and from a subsequent passage it appears that this was based on an estimate that 85 per cent. of the value of the grain would be repaid: the value must therefore have been estimated at Rs. 73,50,000. Besides the grain, Rs. 46,00,000 in cash were advanced to planters, zemindars, traders, &c., and this, was expected, would be repaid in full, making a total recovery of Rs. 1,08,50,000. A return prepared by the Government of Bengal for the use of the Famine Commission in February 1879 shows somewhat different figures:—

	Rs.
Advanced in cash	35,86,300
„ grain (value)	69,68,440
Total	1,05,54,740

Of this up to July 1877—

	Rs.	Rs.
Recovered { Cash	29,77,261	
Value of grain	59,20,327	
Total		88,97,588
Written off as { Cash	1,48,175	
irrecoverable { Value of grain	4,892	
Total		1,48,067
Balance ³ { Cash	5,54,828	
Value of grain	9,54,258	
Total		15,09,086

Out of which about three lakhs have been since collected, and twelve lakhs are still outstanding. If the whole of this sum is paid in, the amount recovered will fall very little below Sir R. Temple's estimate.

95. *General Considerations on the Subject.*—On the whole, considering the hurry and confusion of the time, the impossibility of investigating the security offered by the applicants and even the fact of their necessity, and the profuse way in which advances were given, or, according to some accounts, forced⁴ on the people, it must be admitted that the extent to which they have been repaid is creditable to the honesty and self-respect of the ryots. But this should not blind us to the danger of the precedent, or to the cost at which this relief was given. The grain advanced cost the Government

¹ B. B. II, 107. (T.)

² *Id.* II, 110.

³ The Districts where the heaviest balances remain are—

	Rs.
Muzaffarpur	4,04,861
Darbhanga	1,76,905
Saran	1,34,758
Monghyr	1,78,411
Santhal Parganas	1,03,794
Manbhum	1,57,898

⁴ See Reply to Famine Commission by Mr. Hodgkinson, Collector of Saran. "Not only was the power of trade greatly neutralised, but the people became demoralized and reckless, seeing the extraordinary exertions of Government to get rid apparently of as much grain as possible, by some means or other. Besides the inducement to take advances held out by fixing low prices on the grain, the people were practically led to believe it was almost their duty to take advances, and . . . that a paternal Government would never demand repayment. The bitterness of feeling aroused by the realisation of these advances may be inferred from my predecessor's remark in his annual report for 1876-77, viz., that they would sooner die of famine than be again induced to take advances from Government." Mr. Kirkwood, too, (Bhagalpur) thinks (though approving the system generally) that it was overdone, and "many persons thus supported themselves in semi-idleness who should have been labouring on the roads."

Rs. 1,45,40,000, and out of this about Rs. 61,00,000 have been recovered, making a loss to Government of Rs. 84,00,000; it cost therefore Rs. 21 per head to relieve 400,000 cultivators. If they, including their families, were all in grievous want, or in danger of starvation, and if they received relief in no other form, this would be no excessive expenditure; but it is clear from the reports that many of them received relief in other forms also, and that the theory of personal knowledge taking the place of any test, to some extent broke down. The cultivators in their turn had to pay a severe penalty for their readiness to apply for advances; if they were forced to sell grain at thirty seers to repay what they had borrowed at eighteen seers, they have sold 165,000 tons in order to repay the loan of 95,000 tons. The danger of offering to an improvident people too tempting opportunities for getting advances which they will have to repay at a great sacrifice, is one that should be seriously thought of on any recurrence of similar circumstances.

MISCELLANEOUS.

96. *Emigration*.—In the Resolution of November 7th, 1873, the Viceroy expressed a hope that labourers might be induced to emigrate to such places as the tea districts of Assam and to British Burma. For the cost of the Burmese experiment 50,000% was set aside, and a special officer, acquainted with emigration affairs, appointed to superintend the arrangements; but the outcome of all the efforts made in this direction was lamentably small. Up to the end of December 1874, 5,526 emigrants were sent off at a cost of about Rs. 19¹ a head, “and the class of people who actually consented to “go was not of much value to employers of labour. The emigrants gave a great deal “of trouble; and the experiment was most unsatisfactory as far as Burma was “concerned.” It was even more unsatisfactory as regarded Assam. The tea planters were unwilling to enter into contracts with emigrant-coolies, especially during a year of scarcity; it was evident that unless liberal bounties were allowed and a large recruiting staff entertained, no success would be obtained; and the scheme was abandoned in January 1874.

97. *Prices*.—With regard to prices, there is very little to be said, seeing that they were artificially kept down by the presence of the Government granaries and the resolution to open these for the use of the labourers, and ultimately for sale to the general public, whenever the market rates rose to 10 seers per rupee. But in the earlier months, before these preparations were complete, indications existed which led observers to the belief that prices would have risen very high had it not been for the import of the Government grain. Sir R. Temple says¹—

“In some places” (of North Behar) “the price of rice was a rupee for 9, 8, or 7 seers; in other places, it was even 1 rupee for 6 and 5 seers, which rates indicated famine. In other places, there was no price quoted, as the article was not procurable at all.”

And throughout the period of famine the prices at Patna and its neighbourhood were sufficient to make it worth while for private trade to pour in by railway from the Punjab, the North-Western Provinces, from Oudh and Central India, and from Lower Bengal, nearly 400,000 tons of grain.

98. *Effects of lowering the Railway Freight*.—The order reducing the freight of food grain on the railways by one half, or to $\frac{1}{3}$ of a pie per maund per mile, or one anna per 100 miles, was in force from the 1st November 1873 to the 1st August 1874; Government paying to the railway companies as compensation the amount foregone by them, or one anna per maund, or Rs. 1-12 per ton for 100 miles. The total sum paid as compensation was stated¹ to be Rs. 45,30,000. It is not said how this calculation was made: but in March Mr. Bernard had estimated² that every ton travelled 400 miles on an average. If this estimate hold good, the amount paid represents 647,000 tons brought in by private trade. If the compensation was paid (as estimated above, paragraph 60) on 383,000 tons, then each ton of grain travelled on an average nearly 700 miles. Against this expenditure may be set the profit brought to the Government by the increased railway traffic which the famine created, and which Sir R. Temple calculated at Rs. 63,23,150.³

¹ B. B. II, 125. (T.) Only 1,199 of these were from Behar. See Mr. Toynbee's reply to Famine Commission.

² Government of Bengal, to Famine Commission, dated 8th February 1879.

³ B. B. II, 82. (T.)

¹ *ib.* II, 110. (T.) But in Colonel Dieken's note of 29th November 1875, it is stated as Rs. 45,60,000.

⁵ *ib.* I, 234.

⁶ Of this, Government paid Rs. 33,30,000 for the transport of its own grain. The net increase on all railways in India, excluding the above sum, was Rs. 6,70,000 for 1874-75 (*vide* Colonel Dickens' note, *ut supra*).

The Government of India recorded,¹ in the Resolution of 18th February 1875, that the effect of the measure had been "to stimulate the importation of grain by railway into the distressed tracts;" but there is nothing to show in what way it was believed to have acted, whether by making it profitable to despatch grain from great distances which under the higher rate of freight would have been prohibitory, or by putting additional profit into the pockets of the despatchers who would have found the trade sufficiently advantageous even at the ordinary rates of freight.

99. *Treatment of Subjects of Native States.*—It was at one time feared that Nepal would have to be added to the famine-stricken area;² and the question arose how far the people of that country were entitled to share in the measures of relief designed for Bengal. Sir R. Temple decided that if Nepalese subjects applied for work on relief, they should be treated in the same manner as British subjects, even though their number were thought likely to be as large as half a million (see paragraph 47), and that grain should be supplied to the Nepalese Government at cost price. But in the end it was found that only 1,000 tons of grain were applied for on these terms, and the Nepalese got through their difficulties without any further assistance.

100. *Lesson for future Guidance drawn by the Supreme Government.*—The Government of India reviewed Sir Richard Temple's final Minute in a Resolution³ dated 18th February 1875, and drew the following conclusions for the guidance of future administrators from the experience gained in 1874. The first point dwelt on was the necessity of obtaining early and complete reports of the extent of any failure of the crops, and of the probable consequences on the food-supply of the people. The next was the importance of strengthening the district staff, so as to set the officers free to learn the actual condition of the people. With regard to relief-works it was laid down that "large works should be opened at once, smaller local works subsequently, as the necessity for them arises. When the distress becomes extensive, it is essential that employment should be available near the usual homes of the people." When the numbers are very large, "piece-work is preferable to other methods for their payment." In the most distressed districts "the tests of cooked food and of poor-houses are inapplicable." The giving advances to cultivators was found very useful. The food-supply should be looked to, and "where there is a great deficiency, and good reason to believe that the traders will be unable to meet that deficiency, it may be right for the State to intervene for the purpose of supplementing the general food supply. In doing this, it was better to draw supplies from a distance, and to try by private arrangement with merchants rather than for Government to appear openly in the market. Great advantage has resulted from reducing the railway rates for the carriage of grain.

No doubt the quantity of grain imported had been excessive; but for that the Government of India was solely responsible.

"Having to deal with so vast a population, whose support depended upon many uncertain contingencies, it would have been imprudent not to have been prepared to meet larger demands than those which were actually made upon the Government. If a substantial reserve had not been provided, the success of the relief operations would probably have been attributed rather to good fortune than to foresight. The experience of last year shows the necessity of such a reserve. In the beginning of September 1874 very great apprehensions were felt that the scarcity would be prolonged. This was only averted by a fall of rain at the very last moment when it could have been of use to allow the winter crops to be sown; and if the rain had not then fallen, the rice in reserve would have been urgently required. It must not be forgotten that on previous occasions it has occurred that a second year of drought has followed the first."

DISCUSSION OF THE RESULTS OF THE FAMINE ADMINISTRATION.

101. *Statistical summary of expenditure and relief.*—The following statement shows the cost of the famine according to the figures drawn up by Sir R. Temple on the 31st October 1874, and two columns have been added to compare therewith the estimates which were made at two intermediate periods. It is instructive to observe how the expenditure increased as the principles of relief relaxed and the measures adopted grew in liberality and breadth. The figures in the column for actuals are taken from the Budget statement of 1875-76,¹ except those for advances recovered, which are from paragraph 94. The Budget Statement takes no notice of advances on either side of the

¹ B. B. II, 64.

² *Ib.* I, 223.

³ *Ib.* II, 61.

¹ See page 58, the Budget Statement of 1876-77, p. 84, however without giving details, states the net expenditure at Rs. 6,75,85,330 including Rs. 65,60,000 brought to account in the preceding year omitted till then. Against this set-off is allowed of Rs. 17,00,000 from increased Railway Traffic, leaving a total charge of Rs. 6,58,85,330, or six and a half million sterling.

account, but notes that about half a million further was expended out of Provincial or Local Funds.

EXPENDITURE.

Items.	Estimate of 4th March.	Estimate of 13th April.	Sir R. Temple's figures.	Actuals (as far as known).
	Rs.	Rs.	Rs.	Rs.
Special Establishments - - -	5,00,000	13,50,000	12,00,000	25,00,000
Promotion of private grain trade - - -	15,00,000	34,00,000	45,30,000	45,60,000
Relief-works - - -	1,00,00,000	2,53,00,000	1,28,00,000	1,10,80,000
" excluded from local or private funds.	—	—	—	65,60,000
Grants in aid of private works - - -	5,00,000	5,00,000	1,00,000	—
Darbhanga State Railway - - -	—	20,00,000	10,00,000	14,50,000
Government grain purchase - - -	3,00,00,000	3,78,40,000	4,40,00,000	4,47,06,000
" " transport - - -	1,44,50,000	1,75,00,000	1,76,00,000	1,76,28,000
" reserve transport train - - -	—	18,60,000	31,40,000	31,50,000
Charitable relief - - -	10,00,000	20,00,000	28,00,000	31,71,000
Advances to zemindars, traders, &c. - -	50,00,000	50,00,000	46,00,000	46,00,000
Unforeseen - - -	15,00,000	—	—	—
Total expenditure - - -	6,44,50,000	9,67,50,000	9,17,70,000	9,94,05,000

RECEIPTS.

Items.	Estimate of 4th March.	Estimate of 13th April.	Sir R. Temple's figures.	Actuals (as far as known).
	Rs.	Rs.	Rs.	Rs.
Sales of grain to labourers and the public -	1,50,00,000	1,83,30,000	95,00,000	2,62,40,000 ¹
Sales of grain to Relief Committees - - -		15,00,000	27,00,000	
Sales of reserve grain in Calcutta - - -		37,80,000	7,00,000	
Sales of surplus grain in the interior - - -		—	30,00,000	
Recoveries of cash advances to traders, zemindars, &c. - - -	—	45,00,000	46,00,000	31,00,000
Recoveries of price of grain advanced to ryots - - -	—	71,40,000	62,50,000	—
Miscellaneous - - -	—	—	5,00,000	—
Increased Railway profits - - -	—	—	63,23,000	40,00,000
Total receipts - - -	1,50,00,000	3,52,50,000	3,35,73,000	3,33,40,000
Net expenditure - - -	5,00,00,000	6,15,00,000	5,82,00,000	6,61,00,000

¹ This includes sales of surplus stores, carriage, and steamers, and probably also the recoveries of price of grain advanced to ryots, as far as then known.

At this cost 735,000 labourers were employed for nine months; 452,000 were gratuitously fed for six months; 118,000 tons were sold during a period of seven months (April to October); and assuming that each person bought $1\frac{1}{2}$ lbs. a day or 315 lbs. during the seven months, this quantity would supply 870,000 persons with food. If, again, a quarter of the labourers on relief-works were purchasers, there were about 700,000 of the public who benefited by the sale of Government grain at two-thirds of the cost price. The number who received advances of grain has been estimated at about 400,000 cultivators, or, including their families, 2,000,000 souls; and the number who benefited by the advances of cash to zemindars, traders, &c., was roughly estimated at 500,000. The following, therefore, is the number who in one form or another received relief:—

	Number.	Period.
By relief-works - - -	735,000	9 months.
" gratuitous relief - - -	452,000	6 "
" sales of grain - - -	700,000	7 "
" advances of grain - - -	2,000,000	
" " cash - - -	500,000	7 "
Total - - -	4,387,000	

or about 25 per cent.² of the population of the famine tract, as estimated in paragraph 19.

² Mr. Kirkwood states that at one time fully 80 per cent. of the population of some parts in the North of Bhagalpur were subsisting on Government relief in some form or other.

102. *District details of expenditure and relief.*—The relief administered may be shown in a different way, and the amount received in each District can be more easily compared, by assuming that the relief lasted for seven months, that each person who bought or received an advance of grain got 23 seers for a month's consumption, or 161 seers for seven months, at which rate every ton sold or advanced relieved almost seven persons : and similarly that every one who received an advance of cash received relief at the rate of 1 anna a day, or Re. 1-1-1 a month ; so that every sum of Rs. 13-2 thus advanced relieved one person. This is the assumption made in Mr. MacDonnell's book, and it is subject only to one flaw, *viz.*, that the labourers who received wages in cash also bought grain and thus appear twice over in the number of relieved. By the system of calculation adopted in the table it appears that in the most distressed tracts 2,600,000, or 17 per cent. of the entire population, were relieved for seven months continuously, in the less distressed tracts 5-17,500, or 3 per cent., were so relieved. If it be assumed that half the labouring population bought Government grain and are shown twice over, these numbers will be reduced to 2,200,000 and 512,000 respectively, or 15 and 2-9 respectively :—

Districts.	Population.	Grain Imported. Tons.	Surplus uncapable. Tons.	Cash expended. Rs.	NUMBER OF PERSONS RELIEVED DAILY FOR SEVEN MONTHS.				Per cent. of number relieved to population.
					Relief works.	Grain sold.	Cash and Grain.	Total.	
Saran - - -	2,064,000	40,200	3,800	2,110,500	160,162	3,170	217,915	3-3,277	19
Champaian - - -	1,441,000	29,180	1,600	981,200	71,720	11,031	155,710	2-8,161	17
Darbhanga - - -	2,196,000	118,715	38,875	3,179,300	265,127	111,513	372,509	7-19,150	34
Minzallapur - - -	2,188,000	60,352	13,284	1,163,600	160,662	24,913	251,221	1-57,796	20
Blagulpur (North half) -	957,000	26,318	6,218	160,660	25,107	27,726	111,621	1-61,754	17
Purneah - - -	1,714,000	24,802	2,191	522,700	18,230	14,619	115,367	1-13,210	8
Dinajpur - - -	1,501,000	39,674	7,961	1,272,100	56,750	32,227	210,151	2-29,158	26
Rangpur - - -	2,149,000	12,955	2,925	781,500	17,880	16,687	71,133	1-93,700	5
Bogra - - -	689,000	9,811	2,262	368,500	15,787	17,212	37,571	70,874	10
Total most distressed tract.	14,899,000	362,070	79,118	11,770,600	791,731	261,123	1,549,531	2,600,109	17-1
Shahabad - - -	1,731,000	4,781	648	210,276	6,541	1,788	24,362	32,691	1-9
Gya - - -	1,950,000	3,073	218	92,673	1,117	1,112	20,602	23,131	1-2
Monghyr - - -	1,812,000	8,158	103	403,300	7,250	3,655	62,369	73,174	3-
Santhalia - - -	1,239,000	7,120	1,350	188,000	11,799	1,315	28,260	41,104	3-3
Maldah - - -	676,000	3,916	228	182,200	1,351	6,636	20,920	31,277	1-7
Murshidabad - - -	1,353,000	4,270	182	331,800	4,911	9,285	7,951	21,277	1-6
Rajshahai - - -	1,311,000	4,685	1,860	233,700	2,136	19,781	11,183	36,108	3-3
Pabna - - -	1,212,000	584	2	191,200	1,383	4,064	8,361	13,810	1-1
Birbhum - - -	696,000	3,719	190	175,900	6,112	17,165	11,091	34,671	5-
Bankura - - -	327,000	4,180	76	255,500	3,053	15,101	15,283	33,710	6-1
Bardwan - - -	2,034,000	13,480	2,067	679,600	7,211	35,855	29,121	72,329	3-3
Nadiya - - -	1,813,000	883	20	315,100	3,473	17,119	—	20,622	1-1
Almoham - - -	996,000	8,830	529	267,600	7,112	2,803	49,531	66,748	6-7
Jalpaiguri - - -	418,000	3,321	179	91,408	—	—	—	32,330	7-9
Total partly distressed tract.	17,791,000	69,230	7,939	3,561,737	69,212	126,181	292,598	517,503	3

103. *The good side : no mortality.*—One result at least was attained by this lavish administration of relief that there was absolutely no mortality from starvation. As might have been expected in a matter to which public attention was so riveted, every death that could possibly be attributed to starvation was eagerly canvassed, and its causes closely investigated ; but at the outside not more than 22 deaths could be said to have even been accelerated by hunger. Another point which may be noticed with satisfaction is that there seems to have been no permanent evil effect left on the minds and habits of the people : with one or two exceptions, such as have been noticed at Bardwan, they seem to have shown no willingness to continue to be treated as paupers, but to have gone back to their fields and ordinary occupations as soon as the first harvest was ripe.

104. *The other side : the means disproportioned to the end.*—But it is not sufficient for the advocates of a new policy, which deserts the old landmarks and cuts itself adrift from past experience, to prove that they effected their purpose : it is necessary also to show that the means employed were proportionate to the end aimed at, and that the resources of the State were not unduly wasted. In this respect the administration of the Bengal famine of 1874 can hardly be justified. A few paragraphs may well be devoted, at the conclusion of this section, to considering (1) what would be the effect on the finances of India if the principles of 1874 had been followed throughout the century ; (2) how far those principles can be pronounced to have been correct in their application to the facts of 1873-74 ; (3) whether they were correct under any circumstances, or were altogether untenable.

105. *Cost of other famines, if treated on the Bengal system.*—It has been shown that on the relief of a population of 17 millions who were believed to be visited by severe famine, the sum of six million sterling was spent. Let it be assumed that this rate of expenditure was a proper one,¹ and that a similar rate would have been proper in all the greater famines with which India has been afflicted during the present century. Such a comparison must needs be a rough one, for the famines varied in intensity, and the circumstances of the different parts afflicted were different; but without wishing to push the argument too far, and with all reservations made, the following table fairly represents what the expenditure on these famines would have been, had they been treated as that of Behar was treated in 1874 :—

Year.	Province.	Duration of Famine.	Population severely affected.	Actual cost of Relief.	Expenditure at the assumed rate.
		Years.	(Millions.)	(Lakhs of Rupees.)	(Lakhs of Rupees.)
1803	North-Western Provinces - -	1	10	32	353
1813	Bombay - - - - -	1	4	27	141
1833	Madras - - - - -	1	8	3	282
1837	North-Western Provinces and Punjab	1	15	118	530
1851	Madras - - - - -	1	1½	21	44
1861	North-Western Provinces and Punjab	1	13	57	459
1866	Madras - - - - -	1	13	25	459
	Orissa - - - - -	2	5	127	353
	Behar - - - - -	1	4½	2½	159
1868-69	North-Western Provinces - -	1	5½	46	230
	Ajmir - - - - -	2	1½		35
	Punjab - - - - -	1	3	10	106
	Central Provinces - - - -	1	4½	10	159
	Bombay - - - - -	1	3	6	106
			91	157	3,416

Whereas 4½ millions sterling actually was spent, more than 34 million sterling would have been spent in relieving famine. The addition of 30 millions to the debt of India would have increased the annual expenditure by a million and a half; and though it is too much to say that the finances could not have borne the strain, still undoubtedly it would have been severely felt.

106. *Error of the forecast: extent and degree of the famine overrated.*—But the premise on which the preceding paragraph is based, *viz.*, that a population of 17 millions was in danger of being visited with severe famine, is one that cannot be altogether accepted. It has been made clear that the forecast of the Local Government was unnecessarily gloomy, and that the estimates of the stocks in reserve, of the crops raised in 1873-74, and of the power of the population to endure scarcity, were much too low. Later inquiries, imperfect as they are, have shown that even in the districts which were hardest hit the deficiency of food was much slighter than had been supposed. The Government of India, in the closing Resolution of 18th February 1875,² admitted this to some extent. They wrote—

PANA. 10.—“The anticipation of the effects of the scarcity was found to be somewhat greater than the reality, from two causes. The stock of food in the hands of the people turned out to be larger than was anticipated; and sufficient allowance was not made for the extraordinary exertions which were used by the cultivators to grow a greater quantity than usual of the grain crops which ripen in the autumn. It was impossible to reckon beforehand upon either of these circumstances; but the experience that has now been gained shows, *first*, that where a scarcity follows a fair season considerable supplies of food will probably be in the possession of the people; and, therefore, sufficient time may be

¹ No doubt it may be urged that the greater part of the Bengal expenditure was due to the importation of grain, a policy which in some of the previous famines was unnecessary. But although the arguments of 1873 could hardly have been applied in that year to the Upper Provinces, they would assuredly have been held applicable, by the persons who were convinced by them, to all parts of India, in the years when railway communications were not fully developed; that is, in every previous famine, except that in the North-Western Provinces and Punjab, in 1868-69. Moreover, on the other hand, one measure of relief was cut off from Bengal which has always been applied in other Provinces, *viz.*, remission of revenue: it was impossible to advocate this in Bengal, whereas in some Provinces it had been the chief or only measure of relief, and out of the 457 lakhs of rupees expended on past famines 172 lakhs were remissions of revenue. If the Bengal settlement had not been a permanent one, there can be little doubt (from the precedent of Orissa in 1867) that another two millions would have been added to the Government expenditure. As it was, Rs. 28,649 were remitted in the Santhal District and Rs. 308 in Singhbhum.

² B. B. II, 62.

reckoned upon for the purpose of organising the relief which may ultimately be required ; and, *secondly*, that the cultivators of the soil in India are able and willing to make considerable alterations in their agriculture for the sake of increasing the food-supply at the earliest possible moment, by which means the period over which the scarcity would otherwise extend is considerably shortened."

107. *Attempt to frame an ex-post-facto estimate of the real area of the Famine.*—It is impossible now, with the imperfect information which still exists as it did then, to state with precision, or in such a way as to carry conviction, what the limits are within which severe famine, if it existed at all, would probably have been confined; but there are many indications which lead to the conclusion that the area of extreme distress was the basin of rice land lying along the edge of the Tarai, in the north of Champáran, Muzaffarpur, Darbhanga, and Bhagalpur. This is the tract where rice is the prevailing crop, and it was the winter rice alone that failed extensively. Elsewhere it is clear that the purchasing power of the people, and the activity and enterprise of trade, were underrated. In Saran and the southern parts of Champáran and Tirhut there was no catastrophic failure of the crop: in Dinajpur, Purneah, Rangpur, and Bogra the people could hardly be got to accept direct relief even at extravagant rates of pay; all they would consent to do was to buy grain below the market price; and all through the famine these districts were exporting food grains briskly. No emigration existed to more favoured tracts even on the part of those who have no permanent tie to their homes and no share in the village organization. With a very few exceptions, no signs of emaciation were seen. There are many indications which combine to show that in these tracts, at any rate, the pressure of famine was not severely felt.

108. *Importance of an accurate forecast.*—Now this mistaken estimate was responsible for two things: first, for the vast scale of preparations made for the relief of tracts and of whole districts which were not severely affected; secondly, for the doctrine that all tests ought to be abolished, a doctrine which sprung from the belief that in a country where almost every one was famine-stricken there could hardly be such a thing as an unworthy applicant for relief. Thus, on a review of the whole proceedings, the main lesson to be learnt from the history of this famine seems to be the immense importance of a sound and accurate forecast; and in order to secure this, the main and all-essential requisite is a complete system of agricultural statistics based on a field-survey.

109. *Discussion of the policy of importation.*—Even if the forecast had been correct, and the threatened famine as severe as was supposed, there are two leading details of the system of relief, the propriety of which may be canvassed; these are (1) the policy of Government importation, (2) the substitution of personal knowledge for self-acting tests. As to the first, it is difficult and hardly necessary to give an opinion. The opinion of the local officers seems to have been unanimous that in the northern parts of Behar private trade would not have thrown in grain in sufficient quantities to supply the wants of the people. Against this it has been urged that under all the disadvantages of Government competition and its almost monopoly of the transport, Sir G. Campbell did see grain brought by private traders into Darbhanga, and that no greater difficulties existed here than were overcome by the merchants who in 1877 carried grain to the south of Kaladgi and Belgaum, to Harpanhalli in the Bellary District, and to Shimoga in Mysore. But the fact remains that the action of Government itself prevented this question from being brought to the test of experience, and no one can say with certainty what the results would have been had private trade been left to itself. Moreover, it is generally agreed that, now that these northern districts have been opened out by the Darbhanga State Railway and by improved communications, the necessity of Government importation can never recur. That more grain was imported even to North Behar than was necessary, that much was thrown into places commanded by the railway and the river, where private trade might certainly have been relied on, and that the principle of making provision against a possible second failure of the rains was a mistaken one, are matters on which opinions can hardly be said to differ.

110. *The effect of the abolition of tests.*—As to the second point, it may be safely declared that the famine of 1873 does not establish the principle that it is possible to organise a system under which the relieving officers shall be able to judge, solely by personal knowledge, of the wants of the applicants. However excellent and efficient the inspecting establishment was, there is nothing to show that it would not have been desirable for them to employ the test of work as a condition of relief in the case of all who were able to work; and it is obvious that if this had been done it would have left the officials freer to inquire into the circumstances of the residuum who were unable to work. It is admitted that the relieving officers found it impossible to test the reality of the wants of ryots who applied for advances, and yet it is easier to obtain personal

knowledge of the circumstances of men who possess some landed property, than of those who possess none. It is admitted that they could not judge us to rejection or admission by the appearance of the applicants, because, with a few exceptions in March and April, all looked sleek and well-to-do. It is admitted that the wages given on the relief-works were often larger than could be earned in non-famine years, and that the pauper was able to buy more food than the frugal and industrious self-supporting labourer. These considerations, coupled with the fact that a far greater proportion of the population was in receipt of relief than has ever been known before or after, cannot but throw great doubt on the wisdom of the policy pursued; and seem to compel the conclusion that it would have been wiser for the Government to have enforced the old and approved policy of restricting its assistance in the great majority of cases to the giving of employment on large and useful public works.

SECTION II.—NORTH-WESTERN PROVINCES.

1. *General character of famine tract.*—The North-Western Provinces felt but slightly the effects of the drought which was causing so much suffering in Behar. There were two separate distressed areas. First, the Sub-Himalayan tract in the east of the province, comprising the northern portion of the districts of Gorakhpur and Basti. Here, as in Northern Behar and Bengal, the main crop of the year and the common food of the people is the winter rice, and that crop failed generally for want of rain. Adjoining these two districts, there was also a certain amount of suffering in Ghazipur, a district of very dense population, and where among certain classes of the people poverty is chronic. The second tract includes most of Bundelkhand, that is, Jhansi, Banda, and Hamirpur. The agricultural population of this tract had been struggling with a succession of bad years, which had impoverished landlord and tenant, while the cultivated area had in many parts been seriously diminished by the spread of *kans* grass. Thus the bad autumn harvest of 1873 found the people at the end of their resources. The southern part of Mirzapur, a hilly and thinly-peopled country, may be classed with this tract.

The following table shows the area and population of both the famine tracts :—

District	Affected Portion.	
	Area, Sq. Miles.	Population.
Gorakhpur, Northern portion	2,028	686,000
Basti, Northern portion	1,158	601,000
Ghazipur, Eastern portion	532	352,000
Banda	2,908	697,000
Hamirpur	367	95,000
Jhansi	1,567	317,000
Mirzapur (south)	2,632	173,000
Total	11,192	2,921,000

2. *Rains of 1873.*—The rainy season of 1873 began late and ended early.¹ Some slight showers fell, after dust-storms, about the middle of June. Then the hot westerly winds set in again, and lasted till the rains broke on the 2nd of July. They ceased early, closing on the 9th September in Banda, and by the 18th of September the rainy season was everywhere at an end. It had been interrupted by several breaks, and the deficiency of rainfall and the effect of its too early cessation were especially felt in the rice-growing eastern districts. The following table compares the rainfall of 1873 in these parts with the average rainfall for a number of years :—

District.	Rainfall, in Inches.	
	1873.	Average.
Benares	36.26	40.49
Gorakhpur	39.60	46.36
Basti	23.7	49.76

Average of 20 years.
Average of 10 years.

¹ Administration Report, N.W.P., 1873-74, pp. 2, 3.

The Benares and Gorakhpur figures for 1873 include the rainfall up to the 1st April 1874, and thus represent the deficiency as less than it really was.

The Gorakhpur district is the only one for which the monthly figures are obtainable. They are as follows :—

—	June.	July.	Aug.	Sept.	Oct.	Nov.	Total.
1873 - -	8·90	12·30	14·30	2·50	- -	- -	38
Average - -	6·48	12·92	11·79	8·68	2·76	0·23	42·86

The result of this deficiency of the monsoon was that in all the eastern districts the kharif crop was short, and the rabi crop was sown with unfavourable prospects, and on a smaller area than usual. But where a late winter rice crop is grown, and is followed by a rabi crop of coarse grain, such as grain or pulse, which is the case in the northern parts of Gorakhpur and Basti, the early cessation of rain meant a general failure of the year's crop; and the authorities of the North-Western Provinces, knowing how similar the character of this tract was to the character of that part of Behar in which the expectation of a most grievous famine was then filling the minds of the people, began to make preparations for a somewhat similar calamity.

3. *Good effect of the winter rain.*—Everything, however, depended on the winter rains, which always make the difference between a bad and a good harvest; and this year, the ground having been drier than usual at sowing time, the harvest without them would have been exceptionally poor. The rain held off unusually late, and in January a frost, such as had not been known for years, set in, and continued for some days, and burnt up the pulses, peas, and more delicate crops. “At last, however, the long-delayed rain fell in the first week of February, and the heavy calamity which seemed to be impending was averted. Though too late to do all the good which it might have done had it fallen at the usual time, it was of incalculable benefit, and through its influence a year of high prices was substituted for a year of famine.”¹

4. *Remission and suspension of revenue.*—In the worst part of the Gorakhpur district, the Maharajganj Tahsil, half the rabi instalment of revenue was remitted,¹ and some moderate arrears were allowed to accrue, no one being unduly pressed to pay his revenue in the distressed districts. The remissions in Gorakhpur amounted to Rs. 67,869; besides which over Rs. 30,000 were remitted during this and the following year in the trans-Jumna districts, partly on account of the drought of 1873, and partly because of the impoverished state of that part of the country. Similarly, the excise revenue in this province and also in Oudh fell off considerably; but it is impossible to say what exact sum should be attributed to the effects of the scarcity.

5. *Prices.*—Prices did not, as a rule, range so high as to indicate famine.² In Gorakhpur and Basti wheat in March and April sold at 14 seers per rupee, barley and grain being considerably higher. Rice, however, rose to 11 seers in February, and 10½ from April to June, in Gorakhpur; in Basti it was at 9 seers in February and March, and at 8½ in April, May, and June. The ordinary rate would be about double this, or 16 seers per rupee.

6. *Encouragement of private trade.*—It was urged here, as in Behar, that the distressed tracts were in the habit of exporting, not of importing, that no food stocks existed, and no crop had been harvested, and that private trade would not supply the deficiency. Sir W. Muir would not entertain the idea of Government importation, but preferred to stimulate private trade by advances of money. In Gorakhpur advances were made without interest, repayable in a year, to traders who undertook to store grain in specified places, such grain being purchasable by the Government at a price fixed, so as to cover the expenses of the trader; while those who preferred to import grain for sale at their own discretion received advances repayable without interest in six months. The quantity stored under the former plan was 90,865 maunds, and under the latter plan 10,700 maunds were imported. No actual use was, however, made of the stored grain, the capabilities of the country turning out to be greater than was expected; and of the sums thus advanced Rs. 14,200 had to be remitted ultimately, to cover the losses of the traders and the damage done to the grain. Besides these sums, advances were made to zemindars and ryots to buy seed-grain; the amount thus advanced was Rs. 91,470 in Gorakhpur, Rs. 43,209 in Basti, and about Rs. 20,000 in Mirzapur.³ All this was ultimately recovered.

¹ B. B. II, p. 133.

² *Ib.* II, pp. 136–7.

³ *Ib.* II, pp. 133 and 140.

7. *Relief-works.—Wages.*—The system on which the Government proposed to deal with the famine was the same as had been adopted in 1861 and 1868:¹ relief-works were to be started to employ the able-bodied poor, and those who were unable to work were to be relieved by private charity, which the State should assist, but should not bear the whole burden. The execution of all relief-works was made over in February 1874 to the Public Works Department;² all were to be carried on on the daily wage system, and a Resolution issued on the 10th February fixed the rate of wage. The maximum was to be 1½ annas for a man, 1 anna for a woman, and ½ anna for a child; and below this maximum the rate was to vary with the price of food, so as to be sufficient to enable each person to buy the following quantities:—

	Flour.	Vegetables.
	oz.	oz.
Adult male - - -	16	4
„ female or child above 10 - - -	12	2
Child under 10 - - -	8	2

Looking at the Gorakhpur and Basti prices of the time, it was ruled that the rate of wage for those districts should be (in the local Gorakhpuri pice, of which 5 go to an anna,) 6 to a man, 4 to a woman, 3 to a child.

In Ghazipur a higher rate was paid than even the maximum sanctioned by Government: men got 1½ annas, women 1¼ annas, children ¾ anna. In February and April these rates were successively lowered, till in May they were fixed at 1 anna, ¾, and ½ an anna.

8. *Increase of numbers employed.*—During the early months the numbers employed on the relief-works continued low, and when the spring harvest came in they diminished rapidly. In Ghazipur they fell from 3,000 in the end of February to 800 in the middle of April; in Mirzapur from 2,000 in February to 300 in March; in Banda from 7,000 or 8,000 in March to 900 in April; in Gorakhpur and Basti alone there was no decrease. Early in April the numbers were 80,000 in the two districts; and by the beginning of April they had risen to 219,000. One reason for this was, that the area sown with rabi had been so small in those parts.³

“ But the large and increasing proportion of women and children could not escape notice, and there were considerable doubts as to the extent of the distress which prevailed. On the one hand, it seemed that the relief-works might be popular on account of the difficulty of exacting a full day's labour from the crowds who thronged to them, and the liberty they enjoyed, and on account of the wages being paid in cash at a time when agricultural labour was very slack and there was nothing else for the people to work at. On the other hand, there was the hypothesis that these works were the sole refuge of a famished and despairing population, whose only means of supporting life was by the wages earned on them.

“ Sir John Strachey lost no time, after assuming the reins of government, in visiting the distressed districts, in order to form his opinion with the aid of the best local advice. The conclusion he came to was, that, on the whole, the former explanation was the correct one, and that there was not really any such severe distress as to deserve the name of a famine. He decided that it was not advisable to close the works, but that efforts should be made to make the relief more distasteful by exacting a larger tale of work, and that the wages should be reduced to the minimum which would provide subsistence for the labourers. Evidence was adduced that the scale had, until lately, been too high, and that the relief-works had attracted sellers not of necessities only, but of luxuries. The rates now fixed were on the scale which had been introduced by the Magistrate of Gorakhpur about three weeks previously, the allowance for infants only being lessened by one-half. They were—

For a man - - -	5	Gorakhpuri pice (or 1 anna).
For a woman - - -	4	ditto.
For a child able to work - - -	3	ditto.
For an infant - - -	1	ditto.

“ Thus the exclusion of all who were not in need of aid was left to be gradually effected by the low rates of wages, and the strict demand of a fair day's work from every labourer.”

One result of this was, that a small number of labourers left the Gorakhpur works and crossed the Gandak to join the relief-works in Champaran, where they received 8 pice instead of 5.⁴ There was not, however, any general emigration in spite of the temptation thus offered.

9. *Measures taken to reduce the numbers, and their result.*—Lest any deserving persons should be deprived of relief by these measures, poor-houses were opened, in

¹ *Ib.* II, p. 138.

² *Ib.* II, p. 137. It appears from the reply of Mr. Stoker, then Assistant Magistrate of Gorakhpur, that he considered himself “absolutely prohibited from interfering with or giving any order concerning the works “under the charge of Department Public Works officers.” It was not, however, the intention of the Government to lay down any such principle as to the separation of the two Departments.

³ B. B. II, p. 134.

⁴ *Idem* Mr. Stoker's reply to Famine Commission.

which cooked food was provided for all applicants unable to labour, on the condition of residence, and of doing such light work within the enclosure as would be given them; exceptional measures of relief were sanctioned for "pardanashin women," or for others who, on account of caste or other feelings or prejudices, were prevented from accepting the assistance offered on these terms. The change thus made in the system coincided in point of time with an exceptionally early monsoon.¹

"Towards the end of May, after a few partial showers, the demand for agricultural labour began to make itself felt in Gorakhpur, and from all the works there set in a steady flow of labourers to the fields. On the 30th May rain fell generally throughout the district, and the numbers in daily attendance on relief-works, which had been 89,000 during the last week of the month, sank to 25,000 in the first week of June. The rains had now thoroughly set in, and a few days later the last relief-work was closed, and the three work-houses were opened for the destitute who still claimed assistance."

The following remarks embody the conclusion arrived at by the Lieutenant-Governor as to the reality of the distress and as to the proper measures to be adopted in similar circumstances :—

"These events completely justified the conclusions arrived at by Sir John Strachey on visiting the locality, and they deserve special and prominent record on account of the importance of their bearing on the treatment of future famines. It appears probable that in a slack season of the year the opening of Government relief-works would always attract great crowds of labourers. In a season of considerable pressure, but not of absolute famine, the relief-works in Gorakhpur and Basti were for some weeks daily thronged by more than 200,000 men, women, and children, who found an attraction in the light work, in the liberty of going at night to their houses after attending a sort of vast picnic during the day, and in wages earned at a time when ordinarily they had no employment in the fields and had to live on their harvest savings. But when the wages were cut down to a mere subsistence allowance, when a full day's labour was insisted on, and when the liberty of living at their homes was threatened, these immense crowds melted away as rapidly as they had collected, and it was found that there was hardly any one who really stood in need of relief."

10. *Statistics of the relief-works.*—The returns of the numbers employed were not very carefully kept, and cannot be compiled with absolute accuracy from the official records. The monthly numbers entered in the table below² are taken from the report of the Central Committee³ where they were received from the Public Works Department, but they do not show all the months—only those in which relief was most extensive. On the whole, however, it appears, from a comparison with the casual notices in other reports, that they cannot be much below the mark, though somewhat too low.

	Average daily number.
January (about) - - - - -	2,000
February - - - - -	7,806
March - - - - -	40,996
April - - - - -	133,769
May - - - - -	208,468
June - - - - -	83,150
Total - - - - -	476,189

Looking only at the four worst months, the average number employed from March to June was 119,047.

¹B. B. II, p. 135.

² Number of People employed on Relief Works in the North-Western Provinces in 1874.

DISTRICT.	January.	February.	March.	April.	May.	June.	Total number employed.	Average number.	Period.	Cost per Head.	Total Cost.	Date of the opening of works.	Date of closing the works.
									Months.	Rs. A. P.	Rs.		
Gorakhpur	—	—	21,825	73,201	78,059	29,341	202,480	50,622	4	1 0 0	3,20,144	End of January	Middle of June.
Basti	—	5,000	13,000	50,697	125,908	49,935	280,540	61,385	4	1 11 4	4,28,557	22nd January	22nd June.
Ghazipur	—	800	1,247	647	689	956	4,345	800	5	3 0 3	13,116	Early in February	Last week of July.
Mirzapur	—	over 2,000	300	—	1,300	—	—	—	—	—	25,130	End of December	21st June.
Banda	—	—	3,918	941	329	—	5,285	1,057	5	2 8 4	13,249	End of January	End of June.
Hamirpur	—	—	—	1,323	1,540	1,955	4,818	1,600	3	1 4 4	0,145	Beginning of February.	June.
Jhansi	—	—	703	720	613	801	2,932	733	4	2 6 1	0,083	March - - -	14th July.
Jalaun	Only one work with 180 persons.												
Total	—	7,806	40,996	133,769	208,468	83,150	470,109	94,082	—	1 11 0	8,14,630		

The last three columns are taken from pp. 138-40.

³ B. B. II, pp. 157-59.

The total expenditure on wages was Rs. 8,16,630, or Rs. 1-11-5 per head per mensem : as however the real numbers were slightly larger than here shown, the real cost was slightly less.

11. *System of gratuitous relief.*—In February the Lieutenant-Governor (Sir W. Muir) called a meeting in Allahabad to invite the co-operation of public charity. A Central Committee was formed, and subscriptions to the amount of Rs. 64,995 were collected. Local Committees were appointed in the distressed districts, and the system of administering gratuitous relief was as follows :—¹

“Relief was given in the state of cooked and uncooked food and cash. The cooked and uncooked food consisted chiefly of the cheaper grains, such as dal, bajra, gram, barley, and common rice, and the flower of the *mahu* tree. The sick and infirm under medical direction received more nutritious diet. Relief in cash was distributed principally to *pardanashin* women. The miscellaneous expenditure (where it is not otherwise stated) includes these cash payments. It also includes charges for the construction of poor-houses, for the provision of culinary vessels, firewood, cotton for the employment of those able to spin, and medical assistance and medicines.”

12. *Statistics of gratuitous relief.*—The poor-houses started in Gorakhpur and Basti after Sir J. Strachey's visit, and managed under the orders referred to in paragraph 9, were kept up at the charge of Government, and the statistics of the cost of these are not distinctly given. In both districts the number in June was about 800. In Gorakhpur the maximum was reached in the end of July, when 1,500 was on the rolls; they stood at 1,000 in August, and rapidly diminished towards the end of the month; and in the third week of September all these poor-houses were closed. In Basti the number in August was 1,800, in September 1,200; October opened with 550, and by the 21st the poor-houses were closed. Of the other poor-houses, and other forms of gratuitous relief kept up at the expense of public charity, the following are the statistics :—

DISTRICT.	1874.									Total Number.	Average Number.	Period.	Average Cost per Head of Rations.	Cost of Rations.	Miscellaneous.	Total Cost.
	February.	March.	April.	May.	June.	July.	August.	September.	October.							
Gorakhpur	1,134	1,179	1,233	981	280	319	211	63	—	5,821	723	Months.	Rs. 1 1 6	Rs. 6,402	Rs. 5,982	Rs. 12,384
Basti	—	73	191	200	222	729	630	302	180	3,163	133	8	1 11 10	6,015	1,963	7,978
Ghazipur	2,734	2,379	253	72	81	223	211	237	270	6,101	605	9	0 13 8	5,634	713	6,347
Banda	—	—	1,559	1,159	921	180	203	83	51	1,331	483	9	1 1 6	4,717	2,315	7,032
Hannuwar	161	279	303	438	163	339	636	600	233	3,787	121	9	1 1 0	1,113	2,387	6,530
Jhansi	—	9	12	50	49	53	—	—	—	153	52	5	1 4 10	208	—	208
Allahabad	—	69	237	600	311	22	—	—	—	1,691	219	5	1 3 0	1,611	401	2,012
Central Office	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1,302	1,302
Total	3,705	3,117	3,193	3,224	2,810	2,163	1,995	1,159	723	21,812	3,001	—	1 2 6	23,813	15,097	43,910

Of the balance, Rs. 8,351 were given to sufferers by fire and inundation in different places, and the rest, Rs. 12,160, was invested in Government paper against future contingencies. No contribution was asked for from Government, as the private subscriptions were more than sufficient to meet all the requirements.

13. *Total cost of relief operations.*—The total cost of relief operations of all kinds was Rs. 9,92,923, made up as follows :—

	Number relieved.	Period.	Cost to Government.	Cost to the Public.	Total cost.
Relief-works	119,047	Months.	Rs.	Rs.	Rs.
Gratuitous relief	2,760	9	8,16,630	—	8,16,630
Revenue remitted	—	—	41,689	52,535	94,224
Loss on advances of grain	—	—	75,497	—	75,497
	—	—	14,200	—	14,200
Total	—	—	—	—	1,00,551

Taking the affected population at 3 millions, the cost per head was R. 0-5-6.

¹ B. B. II, p. 151. It appears from the Gorakhpur reply to the Famine Commission that, in that district at least, uncooked food was the rule, and that residence was not insisted on.

² Compiled from B. B. II, pp. 160-63.

SECTION III.—OUDH.

1. *Famine tract.*—The northern part of the districts of Baraich and Gonda is a rice bearing tract, similar to that which adjoins it in Basti and Gorakhpur, and it was affected in the same way by the failure of the rains in 1873. The area distressed was about 2,900 square miles, with a population of 750,000 :¹ but here too, as in the North-Western Provinces, the good spring harvest of 1874, followed as it was by early and favourable rains, prevented the distress from deepening into famine.

2. *Relief measures—System of relief-works.*—The Government resolved to meet this distress by providing employment on relief-works and as far as possible to discourage gratuitous relief.²

"The Chief Engineer, following the practice that has obtained elsewhere, suggested that Government should utilise the skilled and able-bodied labor which is available in times of distress at a lower wage than usual by employing them on remunerative works under the department, and would have referred all other labourers or distressed classes of the population to the district authorities to be fed by charitable relief. He would allow the professional supervisors of works to administer this charitable relief at poor-houses situate near the works, not as officers of the department, but as agents of the Deputy Commissioner. But it was clear that, under such a system, there would be at least as much scope for corruption and peculation as may exist under a system which employs on works all those who can work. We had not to deal with widespread famine actually existing :—all our efforts were directed to avert it. What concerned us first were the people : the return which we sought was not a good bargain wrung out of the labourers, but the preservation of the population in such a state of health, morally and physically, as to enable them at the proper time to resume their ordinary occupations as if the recent calamitous seasons had not occurred."

It was decided therefore to employ all people who would come to the works, however feeble (even little children who could hardly lift the smallest basket of earth), and to pay the daily wages, fixed at the lowest scale sufficient to provide food. The following table shows the rates as prescribed at first and as lowered afterwards in March, when the increased numbers showed them to be too attractive :—

	Early rates.	Later rates.
Skilled diggers - - - -	2 annas	—
Unskilled ditto - - - -	1½ "	1 anna.
Carriers (mostly women), - - -	1 anna	¾ "
Children - - - -	¾ "	½ "
Infants - - - -	—	¼ "

3. *Statistics of relief-works.*—The relief-works were—two irrigation tanks, a drainage channel, the embankment of a river, and the construction and repair of roads. They were for the most part opened in February and were closed in July and August; but the numbers became very small as soon as the rains began in the end of May. In Baraich the highest figures were reached in February, before the lowering of the rates; in Gonda the maximum was reached in May. The average monthly numbers are not recorded, but the following table shows the totals :³

	Total Number employed for one day.	Total cost of labour.	Rate per hand per month.	Average number daily.	Period.
Gonda - - - -	3,593,680	Rs. 182,512	Rs. —	23,958	5 months.
Baraich - - - -	759,046	62,300	—	5,060	5 "
Fyzabad - - - -	57,239	2,997	—	1,908	1 month.
Total - - - -	4,409,965	247,809	1-11-0	30,926	

The total cost of the works, including establishment, compensation for land, &c., was Rs. 3,17,097, and the value of the work done at ordinary rates was calculated at Rs. 1,36,604, or 43 per cent, of the expenditure. The rates for earthwork are probably high in these parts, as the actual cost is said to have varied from Rs. 3-12 to Rs. 8 per thousand cubic foot.⁴

4. *Gratuitous relief.*—On gratuitous relief the expenditure was very small. In Fyzabad Rs. 1,114 was spent; and in Gonda a poor-house received 29,871 persons in all, or about 200 daily for five months. Nothing is said as to the system of management in these institutions. The total cost of gratuitous relief is not shown separately. Rs. 27,000 were contributed by the Calcutta Central Committee,⁵ but the report does not

¹ B. B. II., p. 168.² Ib. II., p. 183.³ Ib. II., p. 170.⁴ Ib. II., 174 and 207.⁵ Ib. II., p. 187.

state how this was spent. The Government expended the sum of Rs. 17,903 on miscellaneous charges, which may have been connected with this head, but the details are not given.

5. *Advances, and storage of grain.*—Advances amounting to Rs. 1,25,000 were made to help in importing grain; and the Deputy Commissioner of Gonda laid in a stock of about 37,000 maunds at the cost of Rs. 90,000. It was not used, and the loss on it and on unrecovered advances was expected to be about Rs. 40,000.

6. *Remission of revenue.*—The remissions of revenue were large, amounting to one-fourth of the whole year's demand in Fyzabad.¹ In Gonda one-fourth of the demand of five parganas was remitted; and in the rest the new assessment which would otherwise have been introduced was postponed. In Baraich a part of the revenue was remitted in six parganas and more was suspended.

These remissions, however, were not due to the drought alone; they were partly owing to this cause, but more to the fact that the revised assessment was greatly in excess of what had been taken before and had been imposed too suddenly before the subordinate shares had been adjusted, and partly to a combination of both these causes. The figures are² as follows:—

District.	REMISSIONS DUE TO		
	Over-assessment.	Drought.	Both causes.
	Rs.	Rs.	Rs.
Fyzabad - - -	1,18,894	—	—
Gonda - - -	2,61,170	³ 1,21,212	14,610
Baraich - - -	—	22,072	51,244
Total - - -	6,83,064	1,16,284	65,854

Perhaps half the figure in the 4th column should be added to column 3 to show the cost of the famine.

7. *Summary.*—The total cost of the relief measures may be thus summarized:—

—	Number employed.	Period.	Cost to Government.	Cost to Public.	Total Cost
			Rs.	Rs.	Rs.
Relief-works - - - - -	30,000	5 months.	3,17,097	—	3,17,097
Gratuitous relief and miscellaneous. - - -	—	—	17,903	27,000	44,903
Loss on advances and on storage of grain. - - -	—	—	40,000	—	40,000
Revenue remitted. - - - - -	—	—	1,79,211	—	1,79,211
TOTAL - - - - -	—	—	—	—	5,81,211

Taking the distressed population at 750,000, the total cost of relief was about Rs. 0-12-6 per head.

C. A. E.

The 5th July 1879.

¹ B. B. II, p. 179.

² Revenue Administration Report, 1872-73. pp. 18-25.

³ Of this sum, about one lakh of Rupees was remitted in favour of a single rich Talukdar, the Raja of Balrampur.

SCARCITY OF 1875-76.

[Compiled from the official Records of the Famine Branch of the (late) Revenue, Agriculture, and Commerce Department.]

1. *Brief History of the Scarcity. The first Warning.*—In the year 1875, again, there was an early cessation of rain in North Behar, and damage was done thereby to the winter rice crop. On the 8th November the Lieutenant-Governor (Sir R. Temple)

* *Viz.*, Champaran (two-thirds).
 Darbhanga (six-sevenths).
 Mozaffarpur (six-sevenths).
 Saran (a half).
 Sapul in Bhagalpur.
 Gya (part of).
 Purneah (part of).
 Dinajpur (a third).
 Rangpur (a fifth).

wrote a minute in which he put the affected population at 17 millions, but trusted that "severity of loss or failure of crop" would be confined to parts of nine districts,* with a population of 8 millions. In these tracts the Bhadoi crop had been good, but the winter rice was believed to have failed to the extent of from a half to two-thirds, and it was anticipated that there would be great loss on the rabi, both from smallness of area and from failure of the seed to germinate

because of the dryness of the soil.

2. *The Lieutenant-Governor's Proposals for Relief of Famine.*—On the 12th November, after further communication with the local officers, the Lieutenant-Governor reported that the rabi would probably be only a half crop at best, and might be worse. "In North Behar the present failure would appear to be nearly as bad as that of 1873." But, on the other hand, the bhadoi crops had been very good, the area of failure was smaller than in 1873, prices were lower, grain dealers more active, crops in the surrounding tracts better, and the stocks in the country larger. The Lieutenant-Governor believed that 300,000 tons would have to be imported for food, about a third of which would be wanted in the more remote parts of North Behar; and that private trade would probably effect this if aided by a railway. Accordingly, he proposed to construct four lines of temporary railway, aggregating 122 miles in length, to lower freights on food-grain, as in 1873, and to establish a steam ferry across the Ganges. The latter proposal was sanctioned, and ultimately one of the railway lines, the branch to Mozaffarpur, was put in hand; but it was sanctioned as a permanent not a temporary undertaking, and on grounds of general expediency as a reproductive work, not especially for famine relief. But the other lines had not been planned or surveyed, nor was it clear that they would ultimately pay for their construction. The loss by rapid construction, *i.e.*, the excess cost if they should be put in hand at once as famine works, was calculated at 36½ lakhs of rupees; and on these grounds they were postponed till the necessity for them should become clearer. Moreover, the Government of India (November 25th) declined to approve the reduction of freight (which had cost Rs. 45,60,000 in 1874), without further and more precise information. They wished to know, in regard to each thana, the population and area, and "as complete a statement as possible of those leading facts on which the extent and pressure of the famine (if any) will depend, such as the character of—

" (a) the last winter harvest;

" (b) the last spring harvest;

" (c) the rain crops.

" The present estimated outturn and prospect of—

" (d) the coming winter crop;

" (e) the coming spring crop.

" The proportional extent to which the several harvests cover the cultivated area of the thana.

" The extent to which the produce of the different harvests, respectively, is supposed to feed the people. The actual prices on the latest date for which the information may be available when the report is submitted of—(1) common rice, (2) lesser millets, (3) Indian corn, at the head-quarters of each thana, with the corresponding prices on the same date in 1871, 1872, 1873, and 1874.

" The communications of, and carriage available in, the thana, the marts or other commercial centres from which, in the event of famine, it would naturally draw its supplies, and the facilities, or otherwise, that exist for drawing such supplies.

" The character of the population, high caste or low caste, rich or poor, purely agricultural or partly, and if so, in what proportion urban or artizan. The character of the proprietors, large landholders and wealthy, small and poor, absentees or unsympathetic with their people, or likely and able to support and aid them.

"The deliberate opinion of the local officers as to the present condition of the people, as to the extent to which the scarcity is likely to affect them, and as to the nature of remedial measures, if any, that are called for."

* * * * *

"But these purely local reports will necessarily lack, to a certain extent, completeness; they will be based on no common standard. One officer will rate the same degree of failure at a higher or lower figure than another; and to enable the Government of India to form a really just conception of the state of affairs, it seems desirable that a special officer of established ability and experience in such matters should be deputed to visit all the presumably threatened jurisdictions, and after personal inquiry and examination of the local reports above ordered, and conference with these several district officials, planters, and intelligent natives, to report fully his views on the state and prospect of the several tracts, together with all such additional facts as he may have elicited." In accordance with these instructions, two officers, Messrs. Geddes and MacDonnell, were deputed to make a joint inquiry and to report on the questions specified.

3. *Lower Estimate of the Area of Distress.*—On the 2nd December the Lieutenant-Governor summarising the information contained in a long official narrative, dated 30th November, sent up a much more encouraging report. Champaran and Saran, Gya and Purneah, Dinajpur and Rangpur, were now altogether removed from the famine area: the only parts regarding which anxiety need now be felt were* two Sub-divisions of Durbhanga, two of Muzaffarpur, and one of Bhagalpur, with a population of 2,400,000. In these the outturn of the rice crop was now considered to vary from four annas in Madhobani to

eight annas in Durbhanga, and the rabi prospects were much better than they had been.

4. *Mr. MacDonnell's detailed Calculations as to the Loss of the Crops.*—On the 7th December, the Government of Bengal submitted notes prepared by Mr. MacDonnell on the food-supply of these five sub-divisions. In these he calculated on such data as are available in those parts, the ordinary outturn of crops, the outturn for the year 1875-76, and the ordinary consumption and export. His conclusions were as follow. In Durbhanga the injury done to the rice crop had not been severe, and the other crops were good; the food-supply was amply sufficient to provide for the requirements of the people with a considerable surplus for export. In Madhobani, the rice-crop was about one-third of the average, and the rabi would be about a half: at these rates the food-supply would be about 38 lakhs of maunds, and the food consumption, seed-grain, wastage, &c., about 48 lakhs, so that nearly a million maunds would have to be imported, provided the reserve stocks were maintained at about their usual height. In Muzaffarpur, the winter rice being calculated at a quarter, and the rabi at half, an average crop, the food-supply would be 41 lakhs of maunds against local requirements of 65 lakhs. In Sitamarhi, taking the winter rice at five-sixteenths, and the rabi at one-third, of an ordinary harvest, the sub-division would have for its food 44 lakhs of maunds, against requirements of 52 lakhs, and from 500,000 to a million maunds would require to be imported. In Supul the estimate was—winter rice a quarter, rabi half a crop; and the result would be a deficiency of about 8 lakhs of maunds. The forecast may be tabulated thus, Durbhanga being omitted as a tract about which no further anxiety need be anticipated:—

Sub-Division.	Estimate of Crop of 1875-76. 16 annas = average.			Anticipated outturn in lakhs of maunds.	Ordinary require- ments for food, Seed, and Wastage in lakhs of maunds.	Deficiency in lakhs of maunds.
	Madhoi.	Rice.	Rabi.			
Madhobani - -	16	5	8	38	48	10
Muzaffarpur - -	16	4	8	41	65	24
Sitamarhi - -	16	5	5	44	52	8
Supul - -	16	4	8	35	42	7

The deduction from these calculations appears to be that Mozuffarpur was the tract most seriously threatened, and that the total deficiency of food was about five million maunds, or about 140,000 tons of food; but the stocks in hand, aided by reduced consumption on the part of the people, would, no doubt, enable them to exist till the next harvest came in. At this time there was no import by private trade going on, nor would the low prices then current admit of any: rice was selling even then in the most distressed part of Madhobani at 22½ seers per rupee. But the Commissioner of Patna, Mr. Metcalfe, writing at the same time (9th December), gave an alarming account of the position which, he said, closely resembled that of 1866, when "the local officers took an optimistic view of the effects of the drought upon local supplies. No steps were taken, and the result was that thousands died." Speaking of the normal condition of Tirhut, Champaran, and Saran, he said, "not only is the cultivation left with an area barely sufficient to raise the food he requires for his family, but in times of drought, having no margin of cultivation left, he is short of food, as the yield is below his requirements."

5. *Brighter anticipations in January 1876.*—The next report is contained in Sir R. Temple's minute of 25th January 1876. He said, that in every case the out turn of the winter rice was now considered to have been better than the original estimate, and he illustrated this by the following table:—

Sub-Division.	Estimate of Winter Rice Crop.		
	8th November.	2nd December.	25th January.
Madhobani - -	4	4	5
Darbhanga - -	6	8	9
Sitamarhi - -	2	5	7
Muzaffarpur - -	5	5	7
Supul - -	2	6	6

Prices also continued low all over Behar, and it was ascertained that in such districts as Saran, Champaran, Monghyr, and Gya, about which alarm had been felt, the harvest had been very little, if at all, below average.

6. *Commencement of relief measures.*—On the 24th January the Commissioner of Patna reported that he had found cases of distress in the Darbhanga District; the lower classes of labourers being pinched for want of their usual employment in harvesting; he had accordingly appointed 6 relief officers (natives) and opened relief-works in part of Madhobani: gratuitous relief was only to be given in grain, not money, to those unable to work. His instructions to the Relief Officers were that they were to call on "the patwari and gamashta of each village for a list of the labouring people who subsist entirely by labour, and who have in the present year neither crops nor harvest work to employ them; to make themselves personally acquainted with the houses of these people and their physical condition: and the day it was ascertained they had no longer any food or means to buy food, to send to head-quarters for instructions as to the relief-work to which the labourers were to be sent." Thus the idea of administering relief on the basis of personal knowledge of the applicants' condition was still, as in 1874, the accepted principle in Behar.

7. *Report by Messrs Geddes and MacDonnell.*—On the 24th January, Messrs. Geddes and MacDonnell, who had been deputed at the end of November to inspect the distressed tracts and collect and compare the information demanded by the Government of India (see paragraph 2) sent up their joint report. It is a production of great ability and of permanent value, not only as showing the frame of mind in which alarmist and sensational reports should be treated, but also on account of the information it gives as to the condition of the Behar ryot, and the historical sketch of the causes which led to his circumstances being so depressed that the slightest seasonal calamity made him an applicant to Government for relief from famine. The report can, however, be but briefly summarised here. They began by showing that while in Sitamarhi the loss of the rice crop had been sporadic, in Madhobani and Supul it had been more widespread and general, especially in the strip along the Northern Frontier: and they calculated that the outturn of the rice-crop was represented by the figures 7, 5, and 6 annas (or sixteenths) of an average crop respectively. The winter rain so far had been good, and they estimated the coming rabi crop for those 3 sub-divisions at 10, 6, and 12 annas,

facilitate supervision and check; 3rd, that only those works of permanent utility should be undertaken which were capable of being completed within a short time; 4th, that as the object was to save people from starvation, and not to attract those who could get employment elsewhere, the rate of daily wages should be kept at the lowest possible scale. The proportion generally adopted was:—

	A.	P.
For a man - - - - -	1	6
For a woman - - - - -	1	0
For a child - - - - -	0	6

“But besides providing for the able-bodied, it was necessary to take into consideration the multitudes of infirm, old, and very young persons who in a season of scarcity are most dependent on the State. In their behalf magistrates were desired to invite subscriptions and donations, and Government undertook to double whatever was obtained.”

11. *North-Western Provinces system of relief works.*—The special relief offered to the able-bodied or rather to those who were not absolutely disabled from working was concentrated on ten important works. The following table¹ shows the average monthly numbers employed on each of these, and the total cost:—

RELIEF WORKS.—AVERAGE MONTHLY NUMBER.

WORKS.	Decem-ber.	Janu-ary.	Febru-ary.	March.	April.	May.	June.	July.	August.	Septem-ber.	October.	Novem-ber.	TOTAL.	Cost.
Mohan Pass - - -	1,054	8,970	10,136	14,755	9,203	15,090	10,022	11,514	2,709	—	—	—	97,018	Rs. 2,45,407
Hapur-Garmukhtesar Road - -	—	1,725	531	1,015	201	1,155	1,766	1,782	1,185	—	245	—	10,355	55,052
Hindan Diversion - - -	—	—	105	1,697	3,240	3,523	3,831	1,827	533	—	—	—	14,761	34,795
Fatehgarh Branch Canal - - -	—	550	2,734	3,363	3,903	8,369	9,272	7,953	4,940	3,723	3,103	1,310	563	1,37,808
Bulandshahr do. - - -	—	—	—	—	—	7,104	7,272	11,342	10,057	7,561	6,194	—	49,533	1,51,390
Rohilkhand Irrigation Works. - - -	—	—	—	—	—	630	701	1,200	1,143	618	207	—	4,620	11,603
Bareilly-Budann Road - - -	—	—	—	—	—	234	1,430	1,496	1,038	941	505	—	6,850	29,424
Agra, Special Works - - -	—	4,091	2,550	2,723	1,923	1,332	1,707	1,023	1,127	770	295	—	18,140	89,032
Shikohabad Road - - -	—	—	—	—	—	378	369	105	—	—	—	—	912	6,000
Ajmir Road - - -	—	—	—	—	—	80	423	57	25	30	7	—	622	2,408
Total - - -	1,054	15,330	22,106	23,558	19,240	33,631	43,789	38,299	23,070	13,625	10,771	1,310	231,404	7,07,531

The highest number employed in any one month was 44,000,² and the average number relieved daily during the 10 months in which the works were chiefly open was 25,140. The average cost was Rs. 3-0-10 per head per mensem. Including the cost of establishments the outlay was Rs. 9,14,294, or Rs. 3-10 per mensem per labourer relieved.

12. These relief-works were carried out by the officers of the Public Works Department, a civil officer being associated with the professional engineer on the largest work, the road through the Mohan pass, in order to assist in the arrangement of the camps, the supply of food, &c. The system pursued as to tasking the labourers, and the views entertained as to the advantages of relief given in return for labour, as compared with gratuitous relief, are explained in the following extract from Colonel Baird Smith's Report (I pp. 17-18):—

“All people then willing to give labour in exchange for wages are admitted on these works. The wages given are calculated at the lowest rate needful for subsistence, and for that only. Profit on labour that is not wanted, but is a mere drug in the market, is wholly out of the question. It is in a pecuniary sense even at least a very expensive method of working, for the average capacity of the workers is much below that of ordinary labourers, and the cost of work so executed must always be high. But no middle course exists between employing those people and maintaining them. They certainly cannot support themselves, and it is better far to accept the high rates of work consequent on their employment than to let them subside into the class of helpless poor or die. It is clear that on special relief-works no specific rates can possibly be fixed. They must range from very nearly the entire cost of subsistence to the rates due for ordinary labour, according to the comparative working capacity of the people employed, and may at any time show fluctuations dependent on this capacity alone, and thus be wholly beyond the control of the officer in charge. Some officers have tried to work

¹ Compiled from Appendix V. G.

² This figure disagrees with the estimate made by Colonel Baird Smith (I, 18), according to which, at the end of April, 143,500 were employed on all the special relief-works, about 80,000 of these being in the North-Western Provinces and the rest in the Punjab. It seems clear that he received inaccurate information as to these numbers.

within limiting rates, but it is only practicable to do so systematically by overlooking the fact that wages on special relief-works are subsistence wages only, and cannot be retrenched for short work without starving the work-people. It is remarkable, however, how well and cheaply, amid all the difficulties of the case, an energetic officer can execute special relief-works. But this comparatively satisfactory result cannot be obtained by reducing wages. It depends on close personal supervision, on the careful adjustment of tasks to strength, in the formation of working parties, so that the strong and the weak may each have just the kind or quantity of work they are best fitted to do. In this way the best may be made of the system, but at best it will never be an economical one. It, however, returns in labour a sensible proportion of the cost of maintaining the people, and, what is perhaps of more importance, it teaches them to continue reliance on their own capacity to work as their best means of subsistence, and maintains their self-respect by keeping them above the position of helpless paupers.

"In reviewing this plan of relief I am satisfied that it has proved a most healthy and satisfactory success. The worst parts of the famine tract have been traversed by long lines of works, or by smaller detached works, to which the suffering people have freely resorted. They have left them, too, whenever the ordinary farming work of the country required their presence.

13. *Value of the works.*—Regarding the value of the work executed, Colonel Baird Smith says¹ that the usual rate for the work he witnessed doing in the Mohan pass was Rs. 4 per thousand cubic feet, while the actual cost was estimated at Rs. 16·2. Mr. Girdlestone says² (speaking of the relief-works in general) that earthwork which would usually be paid for at Rs. 1·6 per thousand cubic feet cost treble the sum, and the Lieutenant-Governor said that he should be satisfied if it could be done for Rs. 3 per thousand cubic feet. No calculation seems to have been made at the end of the famine of the actual value of the work executed.

14. *Other relief-works.*—Besides the special relief-works the ordinary works of construction and repair were carried on by the officers of the Public Works Department and the Local Fund Department according to the sanctioned budgets of the year at the ordinary rates of task-work and pay, and these employed, as estimated by Colonel Baird Smith,³ about 40,000 to 50,000 people. Further the district officers were allowed to open some small local relief-works for the sake of people who were not able to travel to the large relief-works, but were not so physically infirm as to justify their reception in the poor-houses. In order, however, to avoid the danger that able-bodied people might be withdrawn from the larger works or might refrain from going there, "as no native who could obtain an anna and a half a day within easy reach of his own door would go to a distance for a like or even for a larger wage,"⁴ it was provided that on these local works only cooked food should be given and no money wage. The total sum expended in this way was only Rs. 29,918, which at the outside could not provide for more than 15,000 labourers for one month. These works were chiefly carried on in the Meerut District.

15. *Punjab Relief Works.*—The special relief-works in the Punjab were placed under the Public Works Department, and the total sum expended on them was Rs. 3,25,106. No information is on record as to the numbers of persons employed on them,⁵ but assuming that the wages given were the same as in the North-Western Provinces, this sum would represent the cost of 90,000 persons employed for one month, or an average of 9,000 employed daily during the 10 months from January to October inclusive.

16. *Gratuitous Relief for the helpless, North-Western Provinces.*—The other great class of sufferers from famine were defined⁶ as consisting of the helpless from disease, age, infirmity, or other causes, women deserted by their husbands and left with infant children, children deserted by their parents or orphaned by the famine. The support of these unfortunates was considered to be the duty of the public, and subscriptions were invited for this object, to which Government undertook to contribute an equal sum. The principal method adopted for their relief was to open poor-houses for their reception and to distribute cooked food to them. Only two exceptions were found by Colonel Baird Smith in which a different procedure was adopted:⁷ "At Fatchgarh rations of uncooked food were being issued, and at Delhi I found money was distributed at one of the places of relief, paupers coming twice weekly and receiving a sum, graduated according to the number of the family, for their support during the intermediate time. Unhappily the latter plan is so provocative of abuses, notwithstanding the most anxious care to prevent them, that I do not think it ought ever to be resorted to. In fact, it is as a corrective of, or a preventive to, abuses that the supply of cooked food works so well, and excepting in very special cases, and under very peculiar circum-

¹ B. S. II. 4.² G. p. 74.³ I. 19.⁴ G. p. 79.⁵ W. page 39.⁶ B. S. I. 13.⁷ I. 14.

"stances, I am satisfied it should be rigidly adhered to. I found an absolute unanimity on this point among Native Committees, and as all personal details connected with the food are left exclusively to them, the plan has not in my experience been the subject of a single complaint."

Rations vary, but the following are averages :—

For men and women with infants	-	-	-	{ 16 oz. bread. 4 „ vegetables.
For women and lads	-	-	-	{ 12 „ bread. 4 „ vegetables.
For children above 10	-	-	-	{ 12 „ bread. 2 „ vegetables.
For children below 10	-	-	-	{ 8 „ bread. 2 „ vegetables.

17. The poor-house established by Mr. (Sir) J. Strachey at Moradabad, with the special assistance of Syud Ahmed Khan, C.S.I., has since been considered the model of what such an institution should be, and the following extract from Mr. Strachey's Note will give sufficient explanation of the system on which it was worked :—¹

"On the 31st May 2,372 persons were employed in the poor-house in various simple occupations. The working paupers, as already mentioned, are divided into parties, each containing two hundred persons, and each having its separate enclosure and sheds. One or more paid servants superintend the operations of each party, and instruct the paupers in their work. Much of the work of superintendence is, however, done by inmates of the poor-house itself. All working paupers are expected to be present in the places assigned to them at 6 o'clock every morning. They work till 11 A.M., they then rest for about two hours, and during this time they receive their food. They then again work till 4 P.M., when the employment for the day is ended. In the morning each person has a certain task allotted to him. Thus, in the rope manufactory a certain quantity of 'babar' is given to each person, sufficient for the day's work. Each woman employed in spinning receives in the same way a basket containing cotton-wool, which she is expected to return in the evening spun into thread."

"The following statement shows the nature of the work carried on in the poor-house on the 31st May, and the numbers employed in each occupation :—

Nature of Work.	Men.	Women.	Children.	Total.
Cotton-spinning	—	414	—	414
Cloth and Newar manufacture	28	16	5	49
Darri ditto	9	15	—	24
Rope-making	445	302	213	960
Grinding corn	1	303	—	301
Road-making	237	55	47	317
Building sheds and occupations connected with poor-house.	276	28	—	301
Total	996	1,111	265	2,372

STATEMENT showing the EXPENDITURE and ESTIMATED RECEIPTS on account of the MORADABAD Work-House for May 1861.

1.	2.	3.	4.	5.	6.
Nature of Employment.	Articles prepared or work performed.	Quantity of Articles prepared.	Expended on account of Work-house for Raw Materials, &c.	Estimated Value of Articles prepared.	Estimated Profit.
Rope-making - - -	Rope - - -	Mds. S. C. 475 9 12	Rs. A. P. 494 15 2	Rs. A. P. 768 2 3	Rs. A. P. 273 3 1
Cotton-spinning - - -	Cotton thread - - -	28 38 5½	396 1 0	481 2 6	85 1 6
Durri-making - - -	Durri- - - -	43 in No.	32 14 3	48 8 0	15 9 9
		Mds. S. C.			
Newar-making - - -	Newar - - -	0 24 7	10 1 10	10 9 0	0 7 2
Cloth-making - - -	Coarse cotton cloth - - -	75 pieces.	43 3 3	47 3 3	4 0 0
Grinding corn - - -	Flour - - -	—	8 12 5	148 4 2	139 7 9
Road-making, &c. - - -	Repairs to road and earth work.	—	4 12 0	199 0 0	194 4 0
Total - - -	- - -	—	990 11 11	1,702 13 2	712 1 3

18. It is not possible to state with accuracy the number of people supported in these poor-houses, the reports of the time being defective, and in some cases obviously incorrect. This form of relief appears not to have commenced (except perhaps in a very modified form) till January, in which month about 3,800 persons were fed daily in the Doab Districts and in Agra and Muttra. In the Rohilkhand Districts some 2,000 were fed daily in February and 11,000 in April, and at the end of that month Colonel Baird Smith found¹ that 101 poor-houses were open, and he estimated that 80,000 people were relieved in them. In the middle of June² he estimated the numbers at 140,000. In all probability³ the total number relieved for one day in the 17 districts of the North-West Provinces may be put at 9,120,000 approximately, or 304,000 for a month, or for the nine months period from January to September inclusive an average of 33,800 a month. The total cost of their relief was Rs. 5,41,783, or Re. 1-12½ per head per month.

19. *The Central Relief Committee.*—A Central Relief Committee was established at Agra in January 1860, to which was committed the care of collecting the subscriptions of the public and distributing the money required for gratuitous relief to the different districts. They received in all from outside the Province the sum¹ of Rs. 9,28,000, of which Rs. 3,07,000 (the equivalent of 30,000*l.*) was subscribed in England and sent out by the Lord Mayor of London; local subscriptions raised in the Province amounted to Rs. 1,34,000, and Government contributed Rs. 1,02,000. This, with some miscellaneous receipts, made a total of a little over Rs. 11,80,000. Their expenditure was as follows:—

	Rs.
Gratuitous relief - - -	5,42,000
Local relief works - - -	30,000
Grants for seed grain and bullocks - - -	3,40,000
Funded for orphanages - - -	2,70,000
TOTAL - - -	11,82,000

The amounts given for seed grain and plough bullocks were allotted to the different districts according to the estimate made of their losses, and were distributed to the cultivators by the Collectors and their subordinate officers.

20. *Pardah-nashin women.*—Another class to whom gratuitous relief was administered was the destitute Muhammadan women whom the custom of “pardah” or

¹ I. 16.

² II. 9.

³ Mr. Girdlestone's Appendix VII. gives the number of rations issued up to the end of October as 15,120,000: but there are certain apparent errors in the figures. In most cases the number of rations represents the number of persons relieved, and the average cost of a ration is .95 of an anna. But in Bundelshahr 5,200,000 rations were given at a cost of Rs. 31,523, or only .094 of an anna each; and up to the end of July in this district only 596,000 persons had been relieved. The figure 5,200,000 is evidently too large by a cipher. Similarly Muttra and Agra show excessively high numbers, which cannot be correct for the same reason. The average cost of a ration in all the districts excepting these then is .95 of an anna, and assuming this rate for all relief, an expenditure of Rs. 5,41,783 corresponds to the issue of 9,120,000 rations.

¹ G. pp. 87, 88, and 29, 30.

seclusion prevented from coming to the poor-houses. Their cases were examined into by experienced and well-informed native gentlemen, and relief was given them on condition of their earning it by labour at the spinning wheel. Enough money to support them for a week or a fortnight was given to each, with a quantity of cotton to be spun at the rate of 2 oz. a day; on their returning this quantity spun into thread at the end of the period, they received a fresh supply. Meerut and Moradabad were the only districts in which apparently relief of this kind was given to any appreciable extent.

21. *Principles of gratuitous relief.*—Colonel Baird Smith's conclusions as to the principle which should govern the distribution of gratuitous relief are of sufficient importance to be quoted here in their entirety.¹

"1st.—Relief by cooked food only, the nature of the food however being cautiously adapted to the physical strength of the paupers.

"2nd.—Either a careful system of selection by the personal enquiries of competent sub-committees, or permanent residence within the relief house, should be conditions of *continuous* relief. No conditions need be attached to casual relief excepting evidence of suffering from hunger, about which there is rarely any risk of error.

"3rd.—The principle that all who can work shall work in ways suited to their capacity should be carried out as much as possible with permanent paupers. A relief-house gradually developed into a true work-house, where the totally helpless are cared for and supported, while the partially helpless are occupied in such light work as they are accustomed to, or are fit for, is the most satisfactory form the relief of this class of paupers can assume.

"4th.—Relief should be interpreted liberally, and be made to include relief from nakedness as well as hunger, and from disease by medical treatment and hospital comforts.

"5th.—Cautious extension of out-door relief in the cases of female paupers of respectable position, by whom appearance in public would be felt as an intolerable degradation. When practicable, appropriate labour may be required in exchange for food.

"6th.—The extension of relief houses throughout the interiors of districts, especially in the sections of greatest intensity, wherever European or reliable native supervision can be secured."

22. *Gratuitous and other relief in the Punjab.*—The measures adopted in the Punjab were very similar to those in the North-Western Provinces. A central committee was appointed who collected from the public subscriptions to the amount of Rs. 10,50,275, and received from Government a grant of Rs. 80,439, the equivalent of the local subscriptions. This money they distributed to the necessitous districts, first for the expenses of the gratuitous relief in poor-houses, afterwards for loans and gifts to supply seed-grain and cattle to the cultivators. Large contributions were also made to the poor-houses by Local Funds, and altogether Rs. 7,83,945 was expended on this form of relief, Rs. 6,01,498 being spent in the Delhi Division alone. There are no complete accounts of the numbers relieved. In the District of Delhi 46,000 persons are said in the Administration Report to have been daily fed; in May in the whole famine tract about 100,000 were fed daily, in June 105,000, in July 116,000, in August nearly the same; but in September the number decreased rapidly, and by the end of October hardly any paupers remained. If the rations distributed were the same and cost the same as in the North-Western Provinces, the sum of Rs. 7,83,945 would stand for the expenditure on 448,000 persons relieved for one month, or, for the 9 months period from January to September inclusive, an average of 50,000 a day. If this is at all correct the numbers must have been extremely low in the four earlier months, and must have mounted very suddenly in May.

23. *Advances to Cultivators.*—Besides the money devoted by the committee for advances to cultivators (Rs. 2,27,000) a further sum of Rs. 3,33,456 was laid out by Government, making a total of Rs. 5,60,456, and this was chiefly appropriated to the Delhi and Hissar Divisions. The money was distributed by the Tahsildars after enquiries made in each village, and their work was supervised by an Assistant or Extra Assistant Commissioner. "Without these measures," writes the Commissioner of Hissar, "the favourable rains vouchsafed would have been of little avail, the agricultural community must have succumbed, and the ruin which has marked former visitations of the kind would have been the inevitable consequence."²

24. *Emigration.*—Particular attention was paid by Colonel Baird Smith to the subject of the voluntary emigration which was going on to a great extent during his tour of inspection, and which is a measure to which the people of India have always resorted in times of scarcity. He estimated³ the number of emigrants at about half a million. His data were based on the enquiries made by the Collectors of Muttra, Meerut, and Aligarh, in which districts the number of emigrants was calculated at 10½, 3, and 5 per cent. respectively of the population. In Muttra alone 90,000 people were found to have

left their homes, and from this he estimated the emigration from the south part of the west tract at about 125,000. In the Doab he put it at about $4\frac{1}{2}$ per cent. of the affected population, or 250,000. The Magistrate of Moradabad calculated the emigrants from his district to have been about 50,000; and on this ratio the number who went away from the famine tract in Rohilkhand would be about 125,000. In this way the sum total of half a million was arrived at; and of this Colonel Baird Smith conceived that about $\frac{1}{10}$ emigrated to Foreign States, $\frac{6}{10}$ to British districts beyond the famine tract, and $\frac{3}{10}$ to famine districts less severely afflicted, and especially to the canal tracts. Some enquiries made afterwards by Colonel Brownlow¹ in the tract irrigated by the East Jumna Canal shewed that about 10,000 new immigrants had settled down in the 850 villages of that tract. On this basis Colonel Baird Smith calculated that 50,000 might have similarly settled along the Ganges, and 20,000 along the West Jumna Canal. He evidently looked on this great emigration as a healthy sign and a natural effort for self-preservation made by the people, a large proportion of whom would be sure to return home when regular seasons set in. There is no suggestion of a fear that this emigration would be likely to induce a great mortality.

25. *Mortality*.—What that mortality was there is hardly any evidence to shew. The system of registering vital statistics had not then been introduced. The Collector of Bulandshahr took some pains to ascertain how many deaths in his district were due directly to famine, and he computed the number at 24,700, or $2\frac{1}{2}$ per cent. of the population. At this rate, Colonel Baird Smith says,² the total number of famine deaths in the central tract must have been 80,000 or 90,000. In a small area of the Delhi District the mortality was found to be $8\frac{1}{2}$ per cent. of the population. This rate, he believed, would apply to the whole southern part of the Trans-Jumna tract.³ This would give a mortality of over 200,000 on a population of $2\frac{1}{2}$ millions. In the Punjab the mortality was said to have been extensive; many deaths from starvation were reported; but no estimate was made of its amount. Gurgaon during the month of June 1861 suffered from cholera, to which, says the Administration Report, many "of the population may have been predisposed by privation." Sir A. Cotton estimated the entire mortality at 200,000 at least.⁴

26. *Suspensions and remissions of revenue*.—When the famine was first anticipated, very liberal ideas as to the collection of revenue were in vogue. The Lieutenant-Governor, North-Western Provinces, in July wrote to warn the Board of Revenue that suspension of the kharif instalments might be unavoidable, even if remissions did not ultimately become necessary.⁵ Colonel Baird Smith believed⁶ that the remissions of Government revenue would amount to about 40 lakhs of rupees. But in the end it seems that only 13 lakhs of rupees were in arrears at the close of the famine in the North-Western Provinces, and of those all but Rs. 2,34,646 was ultimately collected. Nothing has been publicly recorded to shew what cause induced this change in the minds of the local authorities: whether on abstract principle they decided on enforcing a more rigid collection of the Government demand than they had at first intended, or whether the recovery of the country was so rapid that they considered that the balances could be collected without distress or harshness. To the loss of revenue should be added a reduction of some Rs. 70,000 in the receipts for the year from excise.⁷ In the Punjab the remissions were much larger, amounting altogether to about⁸ 14 lakhs of rupees.

27. *Crime*.—The increase in the number of offences against property was not large,⁹ and the orderly conduct of the people was matter of general remark in both Provinces.

¹ B. S. II. 56.

² B. S. II. 7. But as the population of Bulandshahr is about $\frac{1}{6}$ of that of the whole Doab tract, the mortality in that tract might have been put, at the same ratio, at 150,000.

³ B. S. II. 8.

⁴ G. page 87.

⁵ G. page 72.

⁶ B. S. I. 27.

⁷ G. page 90.

⁸ The exact figure cannot be given; but the "doubtful" and "irrecoverable" balances of 1860–62 amounted to Rs. 14,25,635. These were, in Major Wace's opinion, all due to the famine, and hardly any part of them was recovered. The Administration Report of 1860–61 put the deficit for that year at 11 lakhs (of which Rs. 5,55,126 were classed as doubtful, and Rs. 4,06,769 as irrecoverable, and both these sums were eventually remitted), and the year did not include the demand on account of the rabi of 1861. In 1861–62, Rs. 3,54,996 were written down as irrecoverable. Besides this, the loss on excise in the two years, as compared with 1859–60, was Rs. 2,01,080, or say, two lakhs of rupees. Mr. Girdlestone (page 90) puts the remissions at Rs. 6,74,526, quoting apparently from the report of the Secretary to the Central Relief Committee.

⁹ G. p. 91. Figures for North-Western Provinces—

	Increase in 1861 over 1860.
Dacoities and robberies	131
Burglaries	1,508
Thefts	3,538

No increase was required to the strength of the police. Colonel Baird Smith considered that the great contrast in this respect between 1838 and 1861 might partly be due to the influence of the military operations following on the mutiny, but more to the far healthier condition of native society now than then.

28. *Summary of results of relief measures.*—During and after July 1861 the rainfall was favourable and cultivation was resumed. By the end of October all poor-houses were closed and all relief-works stopped except one. The following table sums up the amount and cost of relief given during the continuance of the famine. Taking the whole affected population as 13 millions, the cost of all the relief measures expended on them amounted to about 7 annas a head:—

Kind of Relief.	Duration.	North-Western Provinces.			Punjab.		
		Average No. relieved daily.	Cost to Government.	Cost to the Public.	Average No. relieved daily.	Cost to Government.	Cost to the Public.
Relief Works special	10 months	25,140	Rs. 9,14,294	Rs. —	9,000	Rs. 3,25,106	Rs. —
Ditto minor	—	—	—	29,918	—	—	—
Gratuitous relief	9 months	33,800	2,00,677	3,50,392	50,000	1,60,758	5,22,116
Grants for seed grain and cattle	—	—	—	3,02,297	—	1,23,033	2,05,000
Loss of Revenue and Exeise	—	—	3,04,646	—	—	16,00,000	—
Funded for orphanages	—	—	—	2,92,960	—	—	—
TOTAL	—	—	14,89,617	9,75,567	—	22,08,897	7,27,116

29. *Relief to Famine caused by Irrigation.*—There are many other points in Colonel Baird Smith's reports which are worthy of attentive consideration in their bearing upon famines,—such as his remarks on the good service done by landowners,² the influence of race and agricultural skill on the power to resist the pressure of famine,³ the good effect of a moderate assessment of revenue fixed for a long period of years, &c. But the only part of his report which it seems advisable to notice more fully in this brief abstract is that in which he dwells on the benefit produced by irrigation. His remarks refer chiefly to the Doab alone. He calculates⁴ the number of masonry wells at 70,000 and of temporary wells at 280,000, irrigating 1,470,000 acres; but this is the irrigation of two years, and these wells could only irrigate half the area under one crop, or 735,000 acres at a time. The Eastern Jumna and the Ganges Canal irrigated, in 1860–61, 706,000 acres.⁵ The irrigation from rivers and ponds in a year of drought he estimates at two per cent. on the total area, but it is so small that it is hardly worth while taking into account. It may be said therefore that 1,450,000 acres were irrigated in 1860–61 by wells and canals. Of these acres we have the crop details for the canals, but not for wells; assuming that the ratios of food crops and non-food crops were the same in both cases, the area under food crops was 1,250,000 acres. Assuming the same ratios to exist for well-irrigated as for canal-irrigated lands, the following was approximately the area and outturn⁶ of the main different irrigated crops:—

	Aeres.	Md. per acre.	Outturn.
Wheat and barley	780,000	12	9,360,000
Rice	130,000	10	1,300,000
Grain	40,000	12	480,000
Arhar, bajra, joar and miscellaneous	300,000	8	2,400,000
	<u>1,250 000</u>	<u>—</u>	<u>13,540,000</u>

The total cultivated area of the Doab is approximately, at the present time, 9,500,000 acres, and may be estimated as having been about nine million⁷ acres in 1860, and the population it contains was about 11 millions. The irrigated area, though only about a seventh of the total cultivated area, produced food enough for more than one third of the population, or four millions of people. Each irrigated acre produced enough to feed

three people (at 1 lb. a day), and thus, on the ordinary calculation that there is about one person to each cultivated acre, the whole of the cultivation is said to be protected when a third of it is irrigated. From this point of view Colonel Baird Smith had good reason for urging the immense benefits conferred by these two canals, and the importance of carrying on the work of enlarging the means of irrigation by completing such works as are already planned and prepared, and by pushing on surveys and enquiries into the means of utilizing the other rivers, the water of which is still not turned to any useful purpose.

30. *Account of Charitable Contributions from England and elsewhere.*—As this was the first occasion on which large subscriptions were raised in Great Britain for the relief of Indian fellow-subjects suffering from famine, it may be interesting to record the amounts collected, and to show how they were expended. There seem to have been several Committees at work; and the sums they remitted, including generally a very small gain by exchange, were as follows:—

	Rs.	A.	P.
Lord Mayor's London Committee, to Calcutta	5,04,378	12	5
Lord Mayor's London Committee, to Bombay	5,70,105	4	0
Lord Mayor's London Committee, to Agra	2,57,440	12	6
English Provincial Committee, to Calcutta	1,63,740	14	11
Edinburgh Committee, to Governor General	1,46,318	4	3
British Colonies, to Calcutta	23,499	14	10
Subsequent subscriptions sent to Calcutta	57,401	1	3
TOTAL	17,22,885	0	2

or about 170,000l. altogether.

The Bombay Relief Committee disposed of its funds as follows:—

	Rs.	A.	P.
Received from London as above	5,70,105	4	0
„ „ Madras subscriptions	61,768	3	8
Local subscriptions	16,281	1	10
Interest on Government paper	1,273	8	5
TOTAL	6,49,428	1	11

	Rs.	A.	P.
Remitted to Agra Committee	1,00,032	12	5
„ to Punjab	3,41,241	0	0
„ to Government of India (1862) in paper	2,08,154	5	6
TOTAL	6,49,428	1	11

The Calcutta Relief Committee received—

	Rs.	A.	P.
From England (as above)	7,49,020	11	5
Local subscriptions	2,53,391	8	1
TOTAL	10,02,412	3	6

which they expended thus—

	Rs.	A.	P.
Remitted to North-Western Provinces	3,79,000	0	0
„ to Chunar direct	5,669	10	6
„ to Punjab	5,75,000	0	0
Expenses	5,025	6	2
Balance made over to Government of India	37,717	2	10
TOTAL	10,02,412	3	6

The Government of India thus, besides the sum received direct from the Edinburgh Committee, became the residuary legatee of all the local committees, and received from them whatever surplus remained in their hands when the work of relief was over, and no more demand was made on them. Its accounts stand thus:—

	Rs.	A.	P.
Received from Edinburgh Committee	1,46,318	4	3
„ from Bombay Committee	2,08,154	5	6
„ from Calcutta ditto	37,771	2	10
„ from North-Western Provinces, Cash	91,211	10	11
„ „ „ Notes	2,70,000	0	0
From Punjab	5,58,422	12	10
Interest on Notes	1,01,184	13	6
TOTAL	14,13,009	1	10

This money was expended as follows:—

	Rs.	A.	P.
Remitted in 1861 to North-Western Provinces - -	50,000	0	0
Remitted in 1861 to Punjab - - -	50,000	0	0
„ to London for relief of Lancashire cotton weavers in 1863. (Equivalent of 20,000 <i>l.</i>) - -	1,97,105	12	7
„ to Government of Bengal for Orissa famine (1866) -	6,01,400	0	0
„ to Punjab in 1869 for famine relief - -	1,42,300	0	0
Loss on sale of Government paper in 1867 - - -	14,296	10	1
Miscellaneous expenditure on Edinburgh Committee's Fund -	4	0	0
Absorbed into the general revenues to meet the cost of providing for the orphans of the famine - - -	3,57,902	11	2
TOTAL - - -	14,13,009	1	10

The general amalgamated account may be summarised thus—

Receipts.

	Rs.	A.	P.
Subscriptions from England - - -	17,22,885	0	2
Local subscriptions in India - - -	8,11,828	12	1
Government donations, as equivalent, in North-Western Provinces and Punjab - - -	3,61,436	3	6
Recoveries of advances - - -	2,91,032	12	2
Interest on Government paper - - -	1,05,582	0	4
TOTAL Receipts - - -	32,92,764	12	3

Expenditure.

	Rs.	A.	P.
Charitable relief in North-Western Provinces, including advances for seed, &c. - - -	9,85,738	8	9
Punjab - - -	9,87,874	4	7
Total charitable relief in 1861 - - -	19,73,613	13	4
Expenses of Committees, and loss on sale of Government paper - - -	20,443	7	2
Orissa famine relief, 1866 - - -	6,01,400	0	0
Punjab famine relief, 1869 - - -	1,42,300	0	0
Lancashire cotton famine, 1863 - - -	1,97,105	12	7
Taken over to meet expenditure on orphanages - - -	3,57,902	11	2
TOTAL - - -	32,92,764	12	3

BENGAL FAMINE OF 1865-66.

SECTION I.—ORISSA.

[This abstract, as far as regards the events of 1865-66 (Part I.), is compiled from the Report by the Famine Commissioners, Sir G. Campbell, Colonel Morton, R.E., and Mr. H. L. Dampier (Calcutta, 1867), which is referred to in marginal quotations as "O. R." The report is partly judicial in its character, dealing with and judging the conduct of the officials of the province, but I have, as far as possible, avoided touching on these matters. All that I have attempted has been to extract the main facts of the famine, and to record the conclusions of the Commissioners as to the lessons to be learnt for future guidance from what was done, or omitted, by the Government in regard to relief measures. Some extracts have also been made from the Board's Apologia or defence of their action, in reply to the Commissioners' report. In the second part, the narrative of 1867 is partly abstracted from Mr. Geddes' "Administrative Experience in former Famines" (Calcutta, 1874), which is referred to marginally as "G." and partly from the Report of the Relief Committee (R. C.) written by Sir C. Hobhouse, and containing subsidiary reports from Messrs. Molony, Kirkwood, and others.]

PART I.—TO END OF 1866.

The famine of 1866 was most intensely felt in the three districts of Orissa and in the districts or parts of districts immediately contiguous to it on the north. There were, no doubt, minor differences of degree in Puri, Cuttack, and Balasore, but these chiefly

manifested themselves in the earliness or lateness with which the extreme dearth of food set in or became known, and "eventually the tide of famine raged so high all over Orissa that local inequalities may almost be said to have been submerged and lost sight of in one wide-spreading sea of calamity."¹ North of Orissa the Tributary Mahals, the western half of Midnapore, a large part of Manbhum, and a third of Singhbhum, are comprised in the blackest portion of the famine tract. The area less severely affected contains the rest of these districts, Bankura, Nadiya, and Hughli. The following table gives the area and population of the famine tract, thus classified according to the information possessed at the time the Orissa report was written,² and a column has been added to show the population recorded by the census of 1872 :

District.	Total.		Intense.		Severe.		Population by Census of 1872.
	Area.	Estimated Population.	Area.	Estimated Population.	Area.	Estimated Population.	
Puri - - -	2,697	588,000	2,697	588,000	—	—	770,000
Cuttack - - -	3,062	1,293,000	3,062	1,293,000	—	—	1,622,000
Balasore - - -	1,890	500,000	1,890	500,000	—	—	770,000
Midnapur - - -	4,834	700,000	1,567	212,000	1,627	414,000	2,545,000
Manbhum - - -	5,400	1,190,000	1,500	281,000	2,318	310,000	995,000
Singhbhum - - -	3,998	289,000	1,250	162,000	—	—	415,000
Bankura - - -	1,300	208,000	—	—	1,300	208,000	526,000
Nadiya - - -	3,296	1,011,000	—	—	1,152	351,000	1,813,000
Hughli - - -	2,007	1,890,000	—	—	500	482,000	1,188,000
24 Pergumals - -	2,523	1,330,000	—	—	168	65,000	2,210,000
TOTAL - - -	31,007	8,999,000	11,966	3,036,000	7,065	1,830,000	13,154,000

It will be seen presently that the distress felt in the last three districts of the list was of a different kind, and sprang from a different cause, from that experienced in the rest of the famine tract: in the one case it arose only from high prices accompanied by loss of employment: in the other it was due to an almost total failure of food, and involved all classes alike.

2. *Errors as to the population of the famine tract.*—It is of somewhat ominous import to observe, at the outset, that the population of these districts as ascertained by the census, even after the loss of life caused by the famine, was larger by four millions or nearly 50 per cent. than the estimate made of it by the best authorities at the time. With such wide limits of error as to the number of the people, it was impossible for any calculation of the quantity of food required for their support to be even moderately accurate.

3. *Brief history of the famine.* (1). *Its causes.*—The years preceding 1865 had not been unfavourable. The crop of 1863 was not below the average, and that of 1864, though inferior in Puri, was good in Cuttack, and particularly good in Balasore. The export trade of Orissa was considerable, and averaged 20,000³ tons of rice a year during the six years 1859 to 1865: but in the last of these years the quantity exported was unusually large, amounting to 33,000 tons, of which Balasore alone sent away 28,000 tons. This had no doubt depleted the stocks to some extent, but in August 1865 rice was⁴ selling at the normal rate of 30 to 35 seers per rupee in Cuttack, while in Puri it was as high as 18 seers. It was not till September 1865 that an alarm began to be felt about the rainfall. The following table shows the amount gauged during each month of the monsoon; but it is admitted that the instruments used could not always be relied on:—

	1865.			Average of previous 15 years, Puri.	1865.
	Puri.	Cuttack.	Balasore.		Midnapur.
May - - -	13·	7·4	11·55	2·1	16·6
June - - -	5·6	8·1	4·25	9·2	13·3
July - - -	4·3	12·2	5·9	12·2	25·4
August - - -	5·6	7·7	8·25	17·3	9·6
September - -	5·2	7·5	9·3	16·8	17·4
October - - -	—	—	0·3	9·4	—
November - -	—	—	—	1·8	—

¹ O. R. I., 25.² O. R. II., 628.³ O. R. I., 13.⁴ *Ibid.* I., 15.

It appears from this that in Puri the rain was very deficient throughout (for the heavy fall of May was of no use to the crops), while in Cuttack and Balasore it was scanty, but not extremely so, till September, and it was its sudden stoppage after that which caused the evil. In Midnapur it was peculiarly plentiful till after September, when it came abruptly to an end. Thus the rice which was then just full grown withered as it stood, and no grain formed in the ear.

4. *Early anticipations.*—The first alarm was given from Puri about the middle of October, and the fact soon became generally realised both by the official and non-official community, that the premature cessation of rain must cause great injury to the harvest. A panic seized the merchants, and for a short time even retail trade was at a standstill: prices rose rapidly, till, in November, they stood at 7 seers per rupee in Puri and 8 seers in Cuttack. The collectors all applied for leave to make special enquiries into the condition of the crops, and the extent of the losses, with a view to deciding what amount of revenue should be remitted, but this was discouraged by the Commissioner, and refused by the Board of Revenue, who again later on (in January) absolutely rejected the proposal that any remission should be granted.

In the end of November the Board sent up a comprehensive report to the Government of Bengal, which was based on reports received¹ from the different Commissioners of Divisions. They stated² that, except in Eastern Bengal, the crop had been poor everywhere, and that the tracts which had suffered most were Orissa, especially Puri, Midnapur, and three districts in Behar, Gya, Shahabad, and Chumparum, where rice had already risen to 7 seers per rupee. Some collectors considered the crop would be $\frac{3}{4}$, some $\frac{1}{2}$, some as little as $\frac{1}{3}$ or even $\frac{1}{4}$ of an average, but such estimates could not be much relied on: the Board's own opinion was that the crop would be at least half an average one, and in Eastern Bengal not much under an average one. Such a crop would by itself provide food for the people, even though the stocks in hand might be, as they probably were, much below the usual amount; and this being the case there could be no famine. Agriculturists would gain by high prices as much as they lost by short harvest, while for the labouring and poorer non-agricultural population suffering, but not generally famine, was in store. The policy they recommended on the part of the Government was as follows:—

- (1.) The publication of prices-current, in order to facilitate and encourage the operation of the natural laws, which can alone afford real relief in time of widespread scarcity;
- (2.) The provision of labour for the poor by public works;
- (3.) Liberal expenditure on Government estates, in order to set an example to zemindars;
- (4.) As the chief, if not the only reliance in more extreme cases, local private liberality to be exercised through local relief committees.³

This sketch of the policy to be pursued was approved by the Government, and no further enquiries were set on foot to ascertain more accurately what the true extent of the failure was. In Orissa the crop was certainly less than a half, and is calculated by the Commissioners⁴ as being altogether about one-third of an average, but in some parts the outturn was much less. Such as it was, the harvest (forced early into the market in order to pay the demands for rent and revenue which were not suspended) lowered prices considerably; at the end of December rice was at 14 seers in Puri, and 15 seers in Cuttack and Balasore.

5. *The period before importation began.*—In November and December more and more urgent reports were sent up from Puri, in which district the famine first declared itself, of the extreme distress of the people and of the prevalence of deaths from starvation; and in December relief works on a small scale were started; the usefulness of these was, however, hampered by the difficulty the labourers had in buying rice with their wages. Although prices were still quoted at a low figure, the quotations were misleading, for there was hardly any rice to be bought; even in the town of Puri the collector said it would have been impossible to buy Rs. 100 worth of rice a day for any period of time; and in the district the dearth of purchasable grain was even more marked, so that, as far as “the labourers were concerned, the quoted rates might just as well be a rupee a seer; the article is not procurable.”¹ By the end of January prices had gone up to 8½ scers per rupee, at or near which rate they stood till the end of March. The necessity of importation was earnestly pressed on the Board at this time, but in vain; this subject will however be separately treated of in another paragraph. In February distress began to show itself acutely in Balasore, taking the form of an influx of starving people into the head-quarter town, and of an outbreak of grain robberies. But the extent of the impending calamity was still far from realized. The Lieutenant-Governor of Bengal visited Orissa in February and left it without having received from the local officials or the unofficial public any distinct impression as to the extremity to which the loss of the harvest and the deficiency of food or of the means which the traders possessed of importing food had already reduced the population. In a letter dated the 28th March, replying to a proposal of Sir A. Cotton’s which urged the organization of a great system of Public Works, the Government of Bengal² denied the necessity of any such scheme; they said there was no prospect of a famine in Bengal, though there would be local scarcity and distress in some parts; and (referring to a suggestion of Sir A. Cotton’s for the creation of a flotilla for the carriage of food, which they rejected) they added that “the natural fluctuation of prices had been sufficient to attract food to the districts in which it was dearest”—a complete mistake, since there was hardly any import whatever to Orissa. In April the mortality and distress became very severe in Puri and Balasore, and famine began to show itself in Cuttack which had escaped till now, owing partly to its having had a better crop and partly to the employment given and money spent by the irrigation company whose works were being carried on. In May the attention of the public in Calcutta was awakened, a relief committee formed, and subscriptions collected; but the Board of Revenue³ still doubted whether there was any really great deficiency of food or any necessity for Government to interfere by any new measures. Misled apparently by some error, they asserted that rice was still selling in the Puri district at 9½ scers the rupee, and argued from that mistaken premiss, the fact being that rice could hardly be bought for money. But the facts were now at last beginning to be too plain for any misunderstanding. On the 26th May the superintending engineer telegraphed that a grant to Balasore of Rs. 60,000 for relief works was no use: “we want rice;” and on the 28th the Commissioner telegraphed that the rice required for the troops, the prisoners, and the Government establishments at Cuttack could no longer be procured. On receipt of this message the Lieutenant-Governor gave way and sent orders on the 29th May that importation of rice by Government must immediately be begun.

6. *Period of importation.*—From this time the history of the famine becomes closely connected with the progress of the importations. After a little demur and unwillingness to spend too lavishly, the Board, about the middle of June, threw themselves heartily into the work, and in the end rice to the value of about 25 lakhs of rupees (250,000^l.) was imported. But the business was not simple, and the difficulties which had deterred traders were felt with greater keenness by inexperienced officials. There are no harbours on the Orissa coast, and False Point, which offers a secure anchorage during the monsoon, was only then discovered for the first time. The main difficulty was, when the ships had brought rice to the coast, to get it unloaded and carried up to the interior; and here the flotilla recommended by Sir A. Cotton would have been invaluable. One ship after it had reached Balasore was blown out to sea again before the cargo could be unladen; in another case it took five or six weeks to carry the bags of rice by native boats from False Point to Cuttack. It was not till September that any sufficient quantity of food had reached the centres of demand. But as fast as rice came in the relief operations, paralysed for want of it, revived and multiplied. June and July were the months in which the famine was most intensely felt; but in July some centres for the distribution of cooked food were established, some in August, and in September the

¹ O. R. I., 46.

² O. R. II., 146.

³ 22nd May, O. R. I., 86.

full number, 88,¹ were open in the three districts. The mortality was highest in August, consequent on the heavy storms of rain. "The people were then in the lowest stage of exhaustion; the emaciated crowds collected at the feeding stations had no sufficient shelter, and the cold and wet seem to have killed them in fearful numbers."² These rains were followed by floods which caused great injury to the standing crops, and prolonged the distress. In October the quantity required having been to some extent miscalculated, food ran short for a time again and relief had to be curtailed; but some relief was experienced from the scanty early crops which ripened in September, and in November the main rice crop was got in, and famine in Orissa came to an end.

7. *History of Districts adjoining Orissa.*—The history of the famine in the most affected parts of Midnapur and Manbhum corresponds pretty closely to that already described, except that in neither case were the alarming signs observed as early as in Puri. Here too there was an absolute deficiency of food, and yet the prices, though as high as four to five seers per rupee in Manbhum, afforded no stimulus to local traders. Late in the year, Government in Manbhum, and a relief committee in Midnapur, imported food, but only in small quantities; and in both tracts the extremity of famine was endured in July and August; as soon as the new crops came in all was well. In the other districts, Bankura, Burdwan, Nadiya, Hughly, and Murshidabad, the loss of crop had not been sufficient to affect seriously the agricultural population; but the high prices and the absence of purchasers were keenly felt by all artisans and labourers, and above all by weavers. These flocked in crowds to the towns, where gratuitous relief was administered; the measures taken to provide for and deal with them will be narrated presently.

8. *Prices.*—The following statement shows the course of prices during the famine period in seers per rupee³ :—

Month.	Puri.	Cuttack.	Balasore.	Midnapur.	Manbhum.	Bankura.	Howrah.
October 1865	- 13	18	20	13½	17	15	14½
November "	- 9½	11½	16½	13½	16	13½	13½
December "	- 12½	12½	15½	14	14	15½	13½
January 1866	- 11½	12½	12	12½	13	15	12
February "	- 9	9½	9½	11	13	13	10½
March "	- 8½	9½	9½	10½	13	12½	10½
April "	- 6½	6½	8	10½	13	11½	10½
May "	- 6½	5½	7½	9½	10	10	10
June "	- 5½	4½	5½	8½	8½	7	10
July "	- 5½	4½	5½	7½	5½	6½	7½
August "	- 5½	5	4½	6½	5	6	7½
September "	- 6½	5½	5½	7½	5½	5½	8½
October "	- 7½	7½	8½	9	8	15½	8½
November "	- —	12½	16½	17½	16	17	10½
December "	- —	12½	18½	24	26	—	17

The average price of rice before the famine in Orissa was about 30 to 32 seers per rupee, so that, according to these figures, the prices of February to April were from four to five times the ordinary rate, and from May to August six to eight and even ten times the average. But these figures are not altogether to be trusted⁴: the system of sending up weekly returns was a new one, introduced for the first time at the beginning of the famine, and it was entrusted to unaccustomed hands (often policemen), who did not sufficiently distinguish between what the rate was and what they thought it ought to be. They professed to give the price of the dearest and cheapest kinds of rice, but the "cheapest" rice of all was a kind of which very little entered the market, and the "common" coarse rice of ordinary consumption was not registered in the price currents. But the main cause of error was that they failed to show what was a common case—the absence of any rice at all in the market. The prices were often wholly nominal, referring to the last transaction that took place, possibly some weeks before; and throughout the famine one of the peculiar features was the absence of purchasable rice in any quantity at any market except the head-quarter towns.

9. *Mortality.*—The estimates of the mortality are all of a vague and general character, but every one agrees in thinking that it must have been enormous. Cholera (which is rarely absent from Orissa in the early part of every year) broke out with great virulence;

¹ O. R. I., 94.

² Ibid.

³ O. R. I., page 40, Puri, Cuttack, Balasore. Page 107, Midnapur.

II., pages 632-3, Manbhum, Bankura, Howrah;

⁴ O. R. I., 38-9.

and the floods of August, with the cold wet nights that preceded them, raised the deaths rate to its highest point. The Commissioners, after a consideration of all that could be said on the subject, held that an estimate that one-fourth of the population had died was not too high.¹ In 1867 particular pains were taken² to obtain information as to the true number of the population and the mortality that had occurred; the result was that the estimate of the population before famine (which, as shown in paragraph 1, had been 2,381,000 souls) was raised to 3,015,000; of these, 809,561 were calculated to have died, and 115,028 were missing, leaving a population of 2,086,000. That even this was far below the mark was proved by the Census of 1872, which returned the population at 3,031,000 souls. Making the fullest allowance for the return of absentees and for the natural increase of population after the end of 1867 (we know from experience recently collected, that the birth-rate must have been almost reduced to nothing in 1866 and 1867), there must have been really a population of 2,700,000 when this estimate of 2,086,000 was made. Raising the death-rate in the same proportion, the mortality must have been at least a million, and the population before the famine must be reckoned to have been 3,700,000.

For Manbhum the estimate is upwards of 18 per cent., and for Singhbhum 12½ per cent.³ In Midnapur the collector calculated the deaths at 50,000 or 10 per cent. of the population seriously affected; and the commission think this low. For other districts no estimate is given. Putting these data together, it appears probable that in six districts alone the mortality amounted to—

	Population.	Deaths.
Orissa, three districts -	3,700,000	1,000,000
Manbhum -	995,000	200,000
Singhbhum -	415,000	50,000
Midnapur -	—	50,000
Total -	-	1,300,000

10. *Measures adopted by the people for their own relief.*—Of the three measures ordinarily adopted by the native population for their own preservation in times of famine, very little has to be said. Emigration does not seem to have occurred to the minds of any one, except in the form of crowding into the towns and relief centres wherever charity was reported to offer a meal. The people are apparently too stay-at-home in their habits to be inclined to go forth in a time of calamity to seek refuge elsewhere: they mostly remained in their villages and died. Irrigation was almost unknown. The company's new works were still unfinished, but a little water was supplied from one of their branches, the Kendrapara Canal. The tanks were utilized, but their scanty stores were soon dried up. As well-irrigation is unknown, the people could not do anything to protect themselves by redoubling their ordinary industry. Lastly, trade, whether internal or external, hardly existed, and no prospects of advantage stimulated either local merchants to order or distant merchants to throw in supplies. Some rice was carried by sea to Gopalpur in Ganjam, and thence brought by land to Puri. Some, but very little, came down the Mahanadi from Sambalpur in the rains. No statistics or estimates are given as to the quantities thus brought in: Mr. Chapman indeed asserts⁴ (7th March 1867) that they exceeded in amount "all the costly, dangerous, and laborious Government importations by sea," but the data for the statement are not given. It is, however, plain that this may have been true without attributing any great activity to private trade.

11. *Government relief measures.* (1) *Public Works.*—The measure on which the Government in the earlier part of the famine relied chiefly, if not solely, for the relief

¹ O. R. I., p. 21.

² Apparently the *modus operandi* was to distribute tabular forms to every landholder to be filled up by him for his estate. After this was done, deputy collectors were sent to make such enquiries as they could, and especially to check the returns in every village where the loss of crop in 1866–67 was said to have amounted to a half, or where the zemindar's return seemed open to suspicion. It is admitted, however, that these zemindars' returns could not be filled up with much accuracy. The per-centage of loss in each district was shown as follows, comparing the total number dead and missing with the (supposed) total population:—

Cuttack -	-	-	-	-	28·88
Puri -	-	-	-	-	32·18
Balasor -	-	-	-	-	33·75
Total -	-	-	-	-	30·81

³ O. R. I., p. 105.

⁴ O. R. II., 533. See also Board's Apologia, paragraph 31. Ganjam supplied itself, and Orissa too, to some extent, from the south, and the importations from Sambalpur and Chatisgarh were considerable and invaluable.

of distress, was the opening of public works. These were of two kinds: some were carried on by the Public Works Department; and some by the collector, as manager of Government estates. First of all five lakhs of rupees were granted by the Government of India for the carrying on of famine works, including feeder roads in Cuttack and Behar, but no part of this money was spent in Orissa. In December two important roads were undertaken in the Puri District; but the relief thus given was disappointingly small. There were two reasons for this: when the works were begun the collector arranged with the executive engineer that they should be carried out on the principle (1) that work should be paid for by daily wage and not by the piece; (2) that it should be paid for in grain and not in cash. To this second proposal, however, the chief engineer and the local government demurred,¹ declaring it to be undesirable for its officers to be concerned in any such arrangement, and that it was their business to pay money wages, leaving the civil authorities or local committees to manage "any further relief." It was, however, found impossible to make any such arrangements or to provide in any way for the supply of food from the local markets; and the Commissioner, on the 31st January, reported that the works were at a standstill for want of rice, and asked urgently for leave to import.² The Board, however, peremptorily refused permission. "The Government decline to import rice into Puri. If the market favours importers, rice will find its way into Puri without Government interference, which can only do harm. All payments for labour employed to relieve the present distress are to be in cash."³ In consequence of this, the Commissioner directed that wages on relief-works paid for by charitable funds must also be in cash, and that even the distribution of cooked food to the destitute and helpless must be stopped. At the same time, the superintending engineer was impressing on his officers the necessity of husbanding their resources, as it was probable that worse distress was coming; and they were to refuse to employ any one who was not visibly and really in want. He allowed them, however, to pay the labourers either by daily wages or by piece-work according as they (the labourers) might prefer; and he definitely refused to permit the system of petty contracts. Later on, however, finding that it was extremely difficult to compel the labourers to do a fair amount of work, the system of payment by piece-work was introduced. The rates were apparently insufficient to enable the people to earn a livelihood.⁴ But even if this objection had not existed, the impossibility of providing food for the labourers would have prevented the public works from being of any great utility. The irrigation company all this time was paying its own labourers part of their wages⁵ in imported rice, and the consequence was that they attracted large numbers of workmen, and employed on an average about 9,000 people daily, from January to June. In the rains, when the difficulty about providing rice had partly been overcome, the weather was opposed to the successful management of relief-works, and the numbers still continued very small. The following table embodies all that can be ascertained regarding the average daily numbers employed at different periods and the cost of the relief-works:—

RELIEF-WORKS UNDER PUBLIC WORKS DEPARTMENT.

DISTRICT.	Average number employed daily January-May.	Average number employed June-November.	Total expenditure.	Advanced, but no account or expenditure received.
Puri - - -	1,182	2,500 ⁶	Rs. 83,177	Rs. —
Cuttack - - -	—	650	15,638	—
Balasore - - -	—	300	6,877	8,000
Midnapur - - -	—	650	15,308	7,400
Burdwan - - -	—	190	4,612	5,839
Nadiya - - -	—	800	19,726	50,000
TOTAL -	1,182	5,090	1,45,339	71,239

¹ O. R. I., 43.

² "Puri must get rice from elsewhere. May I authorise advance for this purpose for Puri, Cuttack, or Balasore?"

³ O. R. I., 48. The Board in their Apologia state that the reference here was only to importations for the food of labourers, not for feeding the whole people; and they further argue that the Commissioner meant only to import from Balasore, not from across the sea. This, however, seems more than doubtful (paragraphs 95-114).

⁴ *Ibid.* I., pp. 52, 66, 67.

⁵ The Board, however, show (Apologia, paragraphs 125-126) that the Company only imported 125 tons, which only lasted till end of March.

⁶ In Puri, 1,182 were employed daily from January to May at a cost of Rs. 25,099 or Rs. 5,020 a month, or about Rs. 4 each. I have estimated the numbers employed from June to November from the expenditure on this datum.

Besides this, about 1,260 were employed in Puri for the first five months of the year on works specially opened in Government estates.

12. *The management of the works.*—There were complaints on the part of the officials that the famine-stricken people would not come to the works, and that those who did come would not do a fair amount of work. The former statement was true of some classes. The collector of Balasore wrote as follows¹ regarding them :—

“ The class of men by whom the dacoities have been chiefly committed are “Pans” and “Kandras,” who hold but little, if any, land of their own, and eke out their support by working for the better class of ryots. Owing to the scanty crops, these men obtained but little employment at the last harvest, and consequently did not receive the payment in paddy they have been accustomed to earn. Although these people saw no hope of finding sustenance in their own villages, they will not go elsewhere to seek employment. During my tour in the cold season, I strongly urged them to go to the Irrigation Company or to Calcutta for work, assuring them they would be able to get employment at remunerative wages. The only reply I received was—let the irrigation works commence near our villages, and we will readily work in cutting the canals, but we will not leave our homes. Our ancestors never went from their villages to seek work, and we will not. They consider it a disgrace to work as coolies, and it is a common saying of the women—“Let our sons die rather than become coolies.” They call themselves muzoors, “i.e., labourers.” I asked many of the zemindars and other landowners at Sorab, especially those to the west of the Juggernath Road (in August), why more coolies did not come and take labour on Public Works. Their continual answer was, of the men who remain most prefer to die at home, and the few who could be tempted to take unusual employment would run away to Calcutta when they had a few pice. They have not houses near the road, and know it is death to live in the rain.”

But beside the original unwillingness to come to work, there was a further reason for their staying away in the unsuitability of the arrangements made for their employment. The errors of these arrangements are summed up in two phrases: the petty contract system, and the piece-work system. In Balasore there were no special relief-works, and the ordinary public works, to which the people were in vain invited to come, were carried on in the usual manner.²

“ That mode is to work by a system of petty contracts wholly unfitted for relief in times of famine. The contractors make their profit, and under them the work is carried on by gangs, who do hard task-work. Neither under the contractors, nor when working direct under the Government officers, is it possible to measure the work of each individual labourer. He or she must belong to a gang who work in common. Their common work is measured and the money is divided. Hence an individual wishing to earn a livelihood must first obtain admission to a gang, the gang will not admit a labourer who from weakness is unable to do a full day's labour, and, above all, they will not or cannot admit more than a certain proportion of women and children, since these ordinarily do not dig, but only carry. Throughout these events by far the greater number of the applicants for relief have been women and children. Many of the able-bodied men went away to seek more profitable labour in less famine-stricken districts, leaving their wives and families behind them. For people so situated the ordinary form of public works is of little avail. Mr. Windle, the Executive Engineer of Balasore, distinctly tells us that the ordinary task rates allowed did not suffice to provide a sufficiency of food when rice became very dear, and the people emaciated. His work was not in the station, but at a distance where it is admitted that it was very difficult to procure rice. It is evident that for the relief of famine, works must be very specially arranged. And our opinion is that, obstinate and prejudiced as in some respects the Ooryahs are, those of them who are accustomed to labour have not, as has been sometimes supposed, shown, as a rule, an extraordinary determination to refuse work when it has been offered to them under favourable conditions, though many have starved without seeking work at a distance, and some unaccustomed to labour may have starved rather than accept labour close at hand.”

In Puri and Cuttack, the officials of the Public Works Department, though apparently aware of the danger of the piece-work system, adopted it, in despair of inducing by any other method the famine labourers to perform a fair amount of work. On this the Famine Commissioners pronounce as follows³ :—

They sum up their views on the labour question in the following pregnant sentences, which are too important to be omitted here¹ :—

“The conduct of the measures required in famine seems in all parts of the world to involve a constant nice-steering between Scylla and Charybdis, of a character many times repeated. If special relief-works are commenced too early, the ordinary labour market is disturbed without necessity; if too late, this most legitimate of all modes of relief becomes, as we have said, nearly useless. If daily pay be too freely given, the people of all countries when employed for charity will struggle to do next to nothing. If task-work is rigidly enforced, without the means of making it practicable to all, the object of relief may be defeated. If task rates are too hard, they are injurious; if easy in the extreme, it is probably impossible to vary such rates according to the capacity of individuals, and the stronger labourers are enabled to earn far too easy gains, from which it is difficult to wean them.”

The fact was, however, that no steering at all was attempted; the ship drifted into the whirlpool.

² “In the districts west of Calcutta they (the relief-works) were wholly ineffectual to prevent extreme famine. It was before the districts had lapsed into extreme and general famine that such works might have been carried out in a way at once useful to the State and beneficial to the people. In all those districts it may be said that both the state of the people and the nature of the seasons required that anything effectual that was to be done in that way should be done before the 1st June. We must pronounce that up to that time nothing effectual had been done. Works were not attempted on a sufficiently large scale; those that were attempted were not conducted on a footing calculated to relieve the famine-stricken; and, above all, food was not supplied.”

13. *Gratuitous relief.*—Relief committees were started and local subscriptions began to be collected in December 1865, and it has been already mentioned that in Puri cooked food was distributed to the destitute until the Commissioner (5th February) prohibited the system; the result of which was that the charity of the local committee was confined for a time to giving money allowances to a few (425) distressed families. On this the Commission remark³—“Nothing is more clear than this, that though on the one hand “many will not resort to relief centres for cooked food till the last extremity, on the “other, the misery among the very poorest is never properly known till the offer of “food brings out from their hiding-places the poorest and most miserable objects.” But at that time, to have opened many feeding-houses and attracted crowds of starvelings when the supply of food itself was so scanty and uncertain, would have been in the highest degree dangerous and unwise. When rice began to be imported, the feeding centres were rapidly multiplied. No rules were laid down as to the uniform management of these places, and there seems to have been a general want of system about them. No test of admission could be prescribed except extreme emaciation; “for those not so bad “the attempt was generally made to provide some kind of labour, real or nominal, and “food was given in return for labour. But when rice was short at the more distant “centres, those who seemed tolerably able-bodied were turned out of these gangs, “and told to go elsewhere,” though there was hardly anywhere else for them to go to. The condition of residence was not prescribed, and at first there was a great lack of shelter for those who lived at a distance from the centres; and when huts were built they showed much disinclination to reside in them, and “those who did reside there “lived in a manner that must have been demoralising and debasing in the extreme.” No scale was laid down as to the proper ration required in such cases, and there seem to have been great varieties in the quantities of food served out to each person.” There was much caste prejudice; “many were deterred by it from seeking food till it was too “late, and some died without seeking it at all.” But the Commissioners held that too much prominence was given to this last objection. That it was not caste prejudice that was the main cause of mortality is evident from the fact that it is stated on all hands “that by far the greatest loss of life has fallen on those lower castes who had least

¹ Ibid. p. 176.

² O. R. I., 126.

" caste prejudice, whose manner of life least unfitted them to avail themselves of public relief, and who were most accustomed to labour."

14. *Numbers relieved and cost.*—The following statement shows, as far as returns exist, the average daily number of persons relieved in this manner from June to November, and the cost of the relief:—

District.	June.	July.	August.	Sept.	October.	Nov.	Dec.	Daily Average for 6 Months.	Amount expended.	
									Grain.	Cash.
1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
Puri	—	2,844	6,699	9,012	10,846	10,485	—	6,631	16,626	99,660
Cuttack	1,301	4,789	14,090	27,886	34,704	34,581	—	19,559	52,565	280,774
Balasore	5,875	14,890	19,231	38,163	36,838	19,252	10,308	24,093	46,816	232,920
Midnapur	5,155	7,442	9,606	8,752	6,476	4,271	—	6,949	14,300	100,697
Manbhum	322	1,262	2,831	5,825	9,630	4,253	1,925	4,341	1,000	81,360
Total	12,653	31,227	52,357	89,638	98,494	72,845	12,233	61,573	131,307	795,411
Bankura	No return	5,000	5,175	8,223	14,818	Operations gradually closed.		5,536	—	32,446
Singbhum	324	649	649	649	—	—	—	379	—	—
Bardwan	—	845	1,490	327	90	158	—	485	—	8,005
Hugli	—	645	3,242	5,700	6,000	4,900	—	3,414	—	37,470
Howra	—	—	—	1,041	1,041	1,041	1,041	694	—	22,090
Nadiya	2,799	7,380	7,620	533	Operations gradually closed.		—	3,089	—	34,988
24 Parganas	—	264	1,162	3,156	8,862	9,492	—	3,823	—	56,624
Total	3,123	11,983	19,338	19,631	30,811	15,591	1,041	17,420	—	191,623
Grand Total	15,776	46,210	71,695	109,269	129,305	88,436	13,274	78,993	—	987,034

For columns 1-8, see O. R., II. 637. For column 10, see I., p. 101, column 6 of table; for column 11, see II. 640.

Making allowance for the imperfection of the returns, it appears that about 80,000 people were relieved daily for six months continuously; and if the proportions were the same elsewhere as in Orissa,¹ about 30 per cent. of these performed some light labour in return for the food, and the rest were too weak to do any labour at all. The cost of this relief is not easy to calculate. In the first five districts of the list, the paupers seem to have been fed mainly, if not entirely, with imported rice; and of this they received about 90 seers each, or 15 seers a month, or 1 lb. a day. But it is not clear how the cash relief was given, or to whom. Some no doubt was expended in buying rice locally, some in house-to-house money doles as in Puri, some in huts, establishment, &c. In the other districts entered in the lower portion of the list, the money was probably spent in local purchases of rice for the most part; the cost falls at about Rs. 11 per head or almost Rs. 2 a month, for which price in most of these districts about 15 seers could be purchased.

15. *Quantities and cost of rice imported.*—The amount of rice imported² into the Province of Orissa up to the end of November was 271,577 maunds; of this, 253,142³ maunds had been used in the following manner:—

enhance the price received for the quantity actually sold. The value of what remained in hand was calculated at Rs. 3-4 per maund, but the price it actually fetched is not recorded. The principles on which the sales were conducted are thus stated by the Commission¹:—

“Wherever rice could be spared from the charitable distributions of food, it was sold; and the difficulties and disadvantages of the gratuitous distributions were so great, the famine was so much more one of food than of money, that it may be almost said that the rice sold did more real good than that distributed. The system was to sell at two rates, one at or near market rates (so far as there were market rates), and the other cheaper; the former sales being conducted by Government officers, the latter limited to selected persons intermediate between the very poor and those better off, to whom tickets were to be given by the members of the Relief Committees. This last system, however, though it sounds well in theory, seems practically to have everywhere for the most part failed. The committees were very unwilling to exercise an invidious discrimination, the privilege was sometimes given to classes (old women, boys, &c.) which led to imposition, and altogether there was much confusion and abuse, and sometimes terrible crowding and struggling. There seems to have been almost no limit to the quantity of rice which might have been sold at very high prices, if it had been available.”

Of the effects of these importations the commission says:—

“The rice imported was scarcely enough to feed a twentieth part of the population, on full rations, for six months. If by supplying a certain quantity to a larger number and supplementing their means one-tenth of the population was saved (being about, as we said before, a life for every man and imported), a great work was done; though unhappily the number saved would be still much smaller than that of those who died.”

The financial result of these importations may be summed up thus—

	Rs.
Cost of rice imported (4,13,547 mds.)	21,25,861
Deduct receipts from sales	5,62,075
Estimated value of stock in hand	2,90,144
Total	8,52,210
Balance or net cost to Government	12,73,642

16. *Arguments for and against importation.*—Of all the questions raised during the administration of relief measures in the course of this famine, the most important one was, whether it was or was not the duty of Government to import food into Orissa. So far as the arguments used on either side are of permanent weight and interest, it is necessary to recapitulate them; so far as they were based on ignorance of the extent of the calamity and on inaccurate information as to local prices they may be omitted. The opposition of the Board of Revenue rested mainly on the sound theory that if there was scarcity prices would rise, and that high prices would either bring to light hidden stores, if they existed, or else would attract grain from other parts, and that if private trade did not import grain it was useless for Government to think of doing so.² Now as to the existence of local stocks, the opinions of officers on the spot varied. The Commissioner firmly and constantly asserted his belief in them; and the town populace strongly held that the dealers were keeping back stocks in order to enhance the price. But the district officers persistently declared that no large stocks existed, and the irrigation company showed their opinion by importing rice for the use of their own labourers. No doubt, say the Commission in their report,³ there must have been a considerable quantity of grain in the country, or else in the absence of extensive importation almost every one must have died, and the fields have remained unsown; but there were not purchasable stores available in the market for those who wanted grain. The small hoards kept by individual cultivators for their own consumption could not be tempted out by high

prices, and there were no large stocks in the hands of traders. Next, as to high prices attracting grain from a distance, the peculiarity of the country¹ had to be considered; it possessed no body of enterprising traders, and hardly any means of communication. The one road from Calcutta via Midnapur was unbridged, and the coast is a dangerous and difficult one, with no port, no ships, and no appliances for landing cargoes. And in effect it became manifest, as soon as prices rose to famine pitch in Orissa, that they did not have the expected effect, and that no quantities of grain worth speaking of were being carried into Orissa. Lastly, there remained the argument, that if trade did not undertake the task, any spasmodic attempt on the part of Government to take its place would not succeed. The grounds for this opinion were not stated. What was meant probably was not that the thing could not be done, but that it could not be done without enormous and undue expense; and that it could not be done so effectively as to supply all the wants of a great population. In a forcible memorandum written by Mr. Chapman (7th March 1867) in which he still maintained, in spite of the event, that the Board of Revenue had been in the right, he urges² that "as a matter of fact, if the Government had imported into Orissa at all during the early months of the year, it must have done so at immense loss,.....it must have been prepared to pay a much larger price for foreign and inferior rice than that for which it could apparently buy the native rice on the spot."

"In conclusion, I venture to assert, even now, that when famine occurs, unless within very narrow limits, it is beyond the power of Government to overcome it. Immense resources have been brought to bear upon the relief of Orissa since the commencement of June with a minimum of results. Principles, after all, though they may be sucered at, and even broadly denied, cannot be overcome. The State cannot successfully convert itself into a wholesale dealer in grain, and any attempt that it may make to do so is almost sure to end in wide-spread disappointment and failure.

"Nor is this the only evil result of such interference, for the State cannot interfere in such matters only to supplement private operations. It must be prepared, necessarily, to substitute its own machinery entirely for them; at what a cost, and with what tremendous risks, I need hardly point out."

To this the commission reply that the proper course would have been, on the 29th January, not to peremptorily refuse to import rice, but to order inquiries to be made into the allegation that rice could not be bought for the relief-works; if this had been done, the delusion of the price currents would have been dispelled, and it would have been recognised that it was the duty of Government, in some way or other, to make provision for feeding those whom it offered to relieve.³

"If only as an employer of labour in Orissa, we think that Government would have been justified in taking the most effectual means of paying that labour in the shape most effective for the object in view; and if so much had been done in February, we believe, as we have said, that the matter would not have stopped there; the ice being as it were broken, many and great necessities would have been pressed with irresistible force, and much might have been done in the months which elapsed before the setting in of the violent monsoon in June."

In fact, this doctrine has now become so universally recognised that in the famine of 1877 every officer in Bombay, Madras, and Mysore understood that he was bound to see that food stocks were sufficient for the needs of his gratuitous relief and the labourers on relief-works; and if there was any danger of their running short, to purchase from the nearest market that could sell. It has been frequently seen that if this principle is carefully explained and strictly adhered to, the purchase of grain by government for its own paupers will not deter the trade from importing grain for sale to the public. As to Mr. Chapman's assertion that the State's efforts must end in disappointment and failure, it is not easy to understand its meaning. If there is any soundness in the Commissioner's view that every maund of grain imported saved a life, it can hardly be said that the very moderate exertions that were made had a minimum of results. Concerning the general

¹ The Board of Revenue (Apologia, paragraphs 30, 33, 35-8) maintain that the isolation of Orissa and the deficiency of traders have been much exaggerated. "The Orissa report itself contains ample evidence of the existence of petty traders native enough, and the accounts of the operations of the current year, now periodically published, testify to the same thing. . . . In regard to Bengal generally, it is surely absurd to deny the perennial activity of the grain dealers. Grain dealing is one of the standing occupations of the country. . . . The Board have little doubt that the grain trade is even more active in Bengal than to the westward." They quote also statistics which show that Balasore has a considerable export trade to ports along the coast. To this the Government of India replied, that the event had proved the real isolation of that province, and it was a marvel that the Board should even now consider the statements of the Famine Commissioners to be exaggerated, or that, with the advantage of local knowledge, they should not have found this out for themselves.

² O. R. II., p. 533.

³ O. R. I., p. 62.

question of when Government should import grain, the following extracts show the final conclusions of the Commission :¹—

“ . . . The simple rule seems to be that which we have already quoted, viz., that Government should import only when, the want existing, from special circumstances no one else is likely to do so, or the merchants cannot do so to a sufficient extent. Those special circumstances must generally be either physical obstacles, or an extraordinary want of efficient traders. . . . It is now difficult to suppose the case in which it would be the duty of Government to import from Bengal ; but the time may come when all energies, public and private, will be overtaxed. In Upper India such a case is still more improbable ; private enterprise there has hitherto only been limited by the means of transport ; and as Government could not suddenly increase those means, its interference in trade could only do harm. Its duty is rather by every possible means to increase the means of transport of which use may be made on an emergency.

“ In case it should again be necessary for Government to import food into our province, our opinion is, that experience shows that it is better that it should be sold to the public at market rates only, and that no attempt should be made to sell at different rates to different people according to the degree of their ability To the starving, food must of course be given gratuitously, and for the public labourers it must be provided in such a way as best suits the circumstances of each case.”

17. *Apologia of the Board of Revenue.*—The letter of the Board of Revenue (15th August 1867) in which they reply to the censure passed on them by the Famine Commission and the Government, contains some valuable remarks both on this subject and as regards the general causes of failure to appreciate the signs of coming distress. The Board—

(para. 21) “ admit unreservedly that, in their opinion, the measures adopted for the relief of the sufferers from the famine in Orissa and some other places have been shown, by the event, to have been insufficient, and that nothing but the importation of food by the Government, and that at a very early date, would have enabled the local officers to grapple, in any degree, successfully with the famine.”

* * * * *

(Para. 196.)—“ The Board account for the delay which occurred in regard to the adoption of effectual measures to meet the famine thus—

“ (a). From the want of experience of famine by the people themselves, their presentiments of famine were far less distinct, and the outward indications of its approach were far less definite and less early, than they would have been in countries habituated to famine.

“ (b). At the same time, the same want of experience on the part of the administration, local and central, prevented them from realizing the full significance of the phenomena that did present themselves, as officers accustomed to famine might have done.

“ (c). Neither of these causes would have produced very serious results, but for this that all the remedies, heretofore found sufficient for the mitigation of famine in India, were very largely ineffectual in this case. Money was of little use, for it could not be exchanged for food.

“ (d). Neither would even this circumstance have materially paralyzed the power of the Government but for this, that, to be at all largely effectual, it was necessary that the discovery of the full truth should be made, and very extensive measures adopted, many months before the actual outburst of unmistakable famine occurred.”

(Para. 197.)—“ In the Board's opinion, no fair comparison can be made between the action of the administration last year and that of other administrations on former occasions, unless these two vital distinctions of the conditions precedent be fully and honestly recognised and disposed of. They, in fact, constituted the essential distinction, and, as it has proved, the insurmountable difficulty to the authorities in Bengal in the famine of 1865-66.”

(Para. 198.)—“ The Board are well aware that, even apart from the light of the event, it is not possible to look back upon proceedings taken in any important conjuncture without being aware of many things that might have been done better. As regards themselves, for instance, they frankly admit and regret that they did not, even without the orders of the Government, institute in December a closer enquiry into the outturn generally of the harvest. They believe now that such an enquiry might possibly have led to a timely discovery of the full extent of the coming evil, and of the appropriate remedy. They regret that they did not grant remissions of revenue in December 1865. They regret further that, owing to its isolated and therefore unintelligible character, they did not comprehend the important significance of Mr. Ravenshaw's telegram of the 31st January, which, if followed up, might again possibly have proved the means of discovering what was hidden from the authorities.”

18. *Treatment of emigrants.*—Mention has already been made of the crowds that collected in towns in which relief was distributed, and especially in Calcutta, where the numbers were estimated² at from 15,000 to 18,000 in June or July.

“ Nothing could exceed the munificence of the rich native gentlemen of the town in feeding these poor people, but the very extent of this munificence being noised abroad tended to increase the evil ; no discrimination was exercised between the deserving and undeserving beggars ; little or no shelter was provided, and the people so liberally fed lay about the town in a wretched and mendicant condition.”

In August,³ the evils of this system were so strongly felt that the distributors of private charity were prevailed upon to stop their doles of food : a paupers' camp was

¹ O. R. I, p. 175.

² O. R. I, p. 114.

³ O. R. I, p. 114.

formed outside the town, into which the immigrants were compelled to go, and they were gradually sent back to their homes. Altogether 11,515¹ were deported in this way, but many, no doubt, returned, and were sent back again and again. A party of emigrants from Balasore were sent back by sea,² and landed there while famine was still at its height. Other deportations were effected with more care and thoughtfulness, especially in the case of weavers from Jahanabad and other places in the Hughli District,³ for whose reception and employment local arrangements were made before they relegated. It does not seem that the Calcutta authorities made any attempt to employ these immigrants on relief-works in the neighbourhood of the town.

19. *Reliance on local charity and on the zemindars.*—Two other points remain to be mentioned on which the Commission expressed views that it is useful to record here: they are—the reliance that Government should place on local charity administered by the agency of local committees; and on the liberality of the landholders. As to the first—

“Experience has very amply proved that, although this may suffice to meet small, or even in some cases considerable, local distress, it is a resource wholly inadequate to meet anything approaching to severe or general famine. Where the circumstances are favourable, and rich and liberal residents are to be found within the district, as at Murshidabad, local distress of a somewhat severe character may be met, as it was met in that district. But the examples of Nadiya and Midnapur conclusively show that, in the best ordinary districts, the efficient relief of famine, or of very general distress affecting considerable portions of such districts, cannot be approached by the means to be obtained from this source. Where general and excessive distress spreads over such districts, the resources of local charity are completely overtaxed and paralysed.”

As to the second point, it is said⁴ that though the—

“theory is that in return for the benefits conferred on them by Government, the zemindars are to be in patriarchal fashion the fathers of their people,”

yet the practice of 80 years is opposed to this.

“No obligations enforced by legal process compel them to support the poor of their estates in time of famine, and they do not recognise any sufficient moral obligation to do so.”

They are generally of two classes, the old and resident people who are too poor to help, or the rich absentees who have merely bought land as an investment of money.

“It is much to be regretted that the feeling that the landholders ought to support the poor has in any degree deterred the Government from giving liberal aid, for the result is that the poor have starved.”

“We would draw particular attention to the unvarying and decided character of all the evidence taken by us regarding the zemindars of Orissa. It cannot be said that there are two opinions on the fact that the great body of the zemindars have lamentably failed in the duties expected of them. We have described the evil which has resulted, in the past year, from a reliance on them for duties which are theirs in theory, but which the practice of generations has shown that they ignore in fact. And we think it necessary to recur to the subject here, because it appears that this theory of the Bengal Administration is still, to a great degree, made the basis of measures for the future. In the previous letters regarding the settlement, the Board of Revenue recommended fixity of the revenue, to the exclusion of remissions for bad seasons, on the ground that the profits of good years would enable the zemindars to give the ryots the necessary remissions in bad years, as if they thought that the zemindars, being under no legal obligation, would really do so. And in the very letter (No. 5002B., dated 20th November 1866, to the Government of Bengal) with which they submit the report showing the failure of the zemindars in the past year, they say “whatever capital may still be in the hands of the wealthier zemindars will be severely taxed to meet the calls of their tenants for assistance during the coming year,” apparently still imagining the zemindars to be benevolent and enlightened landlords ready to share with their tenants the last shilling of their capital. We observe, too, from the published reports, that it seems to be proposed in the most distressed tracts to make advances not to the ryots but to the zemindars for the benefit of the ryots. It is impossible to subordinate facts to a theory.”

20. *Cost of the Famine in 1866.*—In conclusion, the cost of the famine up to the end of 1866, as recorded in the Report of the Famine Commission, may be summed up approximately as follows:—

	Cost to Government.	Cost to the public.	Total.	Average Number relieved.	Period of Relief.
Gratuitous relief in cash - -	Rs. 5,53,669	Rs. 4,69,601	Rs. 10,23,270	80,000	6 months.
Ditto. do. by importation of food - -	12,73,642	—	12,73,642		
Relief works - -	2,16,579	—	2,16,579	3,310	11 „
Works on Government estates - -	33,404	—	33,404	1,260	5 „
Total - -	20,77,294	4,69,601	25,46,895		

¹ *Ibid.* I, p. 117.

² O. R. I, pp. 124-125.

³ *Ibid.* I, p. 75.

⁴ O. R. I, p. 125.

⁵ *Ibid.* I, p. 118.

⁶ O. R. I, p. 141.

In January the number of applicants for relief began largely to increase, deaths from starvation were reported in great numbers (about 40 a day in the Cuttack District), prices showed a tendency to rise, and reports came in from the district officers giving a melancholy picture of the desolation and distress of the country. On the 12th February a public meeting was held in Calcutta, at which the Viceroy made known what had been recently learnt as to the circumstances of the people, and invited the public to bear its part in the duty of relieving the famine-stricken. An influential committee was appointed, and the sum of Rs. 6,14,503¹ was subscribed. The following principles were laid down as to division of labour:—²

The Government took upon itself the expense and responsibility—

- 1st—Of importing by sea all the rice required for relief.
 - 2nd—Of storing such rice in the first instance in order to its distribution.
 - 3rd—Of providing all the rice required in lieu of pay in the Public Works Department.
 - 4th—Of making all tucceave, seed-grain advances required by zemindars for sowing and other purposes, or for the purpose of local improvements to estates.
 - 5th—Of meeting at its store-dépôts all requirements for rice from the public, and from the Famine Relief Committee, at certain fixed prices.
 - 6th—Of providing, in concert with the East India Irrigation Company, public works sufficient to meet all demands for labour.
 - 7th—Of providing a special staff to superintend the operations of the Famine Relief Committee.
- The Famine Relief Committee took upon itself the expense and responsibility—
- 1st—Of collecting and distributing public subscriptions.
 - 2nd—Of the carriage of rice from the Government dépôts into the interior of the country.
 - 3rd—Of providing sub-dépôts, shops, and other means for the sale and distribution of rice in the interior of the country.
 - 4th—Of administering relief to the public generally by every process except those left in the hands of Government.

The transactions on the part of Government were carried on by Mr. Schalch, the Junior Member of the Board of Revenue; and, for the purpose of these transactions, Mr. Schalch had under him the Commissioner of the Province and a staff of officers entirely independent of the Committee, whose sole duty, so far as their connection with the Committee was concerned, was to import, store, and distribute rice into and out of the Government dépôts in Orissa.

All other relief transactions were carried on by the Committee on behalf of the community; and they acted in concert with certain local committees and had under them a staff of officers entirely independent of the Government, whose sole duty it was to carry on, under orders direct from the Committee, all relief transactions other than those conducted by the Government.

These officers were a Special Commissioner (Mr. Molony) and three young civilians, each having charge of the measures in one district, and under them one or two deputy collectors, a civil surgeon, and four subordinate medical men. The nature of the system carried out by these officers in 1867 leaned, as was natural, to the opposite extreme from the parsimony of 1866; for the calamity had been so great, and the horror provoked by it so profound, that it was not unnatural that the moving principle should be a compassionate desire to relieve distress at all costs, rather than a careful regard for economy in the administration of the public finances.

23. *Importation of Rice.*—These operations were placed entirely in the hands of the Board of Revenue. At first it was intended to import 4,00,000 maunds; this quantity was then raised to 6,00,000, and afterwards to 8,00,000, and ultimately by the end of the year 10,55,825 maunds were imported, which, added to the stock in hand on 1st January 1868, 60,985 maunds, made a total for consumption of 11,16,810 maunds. At the close of the year 1867, the stock in hand was 6,17,642 maunds, so that the quantity actually sold or distributed (including waste and shrinkage) amounted to 4,99,168 maunds. Of this, 1,30,865³ maunds were sold to the public and to Government Departments (*i.e.*, the Jail and Commissariat at Cuttack) and the balance given to the Famine Relief Committee. The rice was bought partly from Calcutta and partly in Burma; and the selling price was fixed at first at Rs. 3-4 per maund for Calcutta and Rs. 2-12 for Burma rice; afterwards, when distress grew severe, before the ripening of the Beali or autumn crops, it was lowered to Rs. 2-8 and Rs. 1-12 or Rs. 2 per maund, and after the winter crop came in it had to be sold at a great sacrifice. The Beali or autumn crop was unusually large and good, and in October 1867 the Board reported that the condition of the people and prospect of the country had so

¹ R. C. p. CCIII.

² R. C. p. VIII.

³ G. p. 307. The balance made over to the Committee is here stated as 3,93,839 maunds, which cannot be made to agree with the amount consumed as stated below in the text. The Board debit themselves (page 306) with Rs. 5,70,813 on account of sale of grain. If this is the price of the 1,30,865 maunds, they got a very high price for it, Rs. 4-6 per maund.

much improved that importation of grain should cease and the embargo on export¹ should be taken off from the beginning of 1868. The local paddy was then selling at about 50 seers per rupee, and it was so much preferred by the people that they could not be induced to buy the imported rice, and the Government sales had almost entirely stopped. The cost of the purchase and importation of this 10,55,825 maunds seems to have been Rs. 47,86,201,² or Rs. 4-9 per maund.

24. *Distribution of rice by the Relief Committee.*—The following statement shows the manner in which the rice made over to the Relief Committee was disposed of by them :³—

	Maunds.
Sold to the public - - - - -	1,59,430
Used as food at poor-houses - - - - -	78,035
Distributed in village relief - - - - -	54,298
„ as wages to spinners and weavers - - - - -	25,263
Wages on light labour - - - - -	1,418
Loss - - - - -	21,052
Total - - - - -	3,39,491

25. *Sales of rice to the public.*—The Relief Committee had the task of conveying the rice from the depôts or golahs in which it was stored by the Government to their own places of sale and distribution, which were generally near the Government golahs, and were scattered all over the country. Out of the 3,39,491 maunds which they received they sold 1,59,430⁴ maunds to the public. The cost of this grain to Government (at Rs. 4-9 per maund) was Rs. 7,27,400: the value at which it was charged to the Committee was Rs. 4,38,431 (or Rs. 2-12 per maund—from which it would seem it was all Burma rice), and it was sold by the Committee for Rs. 3,35,111, or Rs. 2-2 per maund. This, however, is inclusive of some sales at cheapened rates up to April 1868. No rates appear to have been absolutely fixed; the object was to relieve distress, but to interfere as little as possible with private trade: and in the end it was found best “to discover what the applicants for relief could afford to give, and at what prices they could purchase elsewhere, and to regulate the depôt rates accordingly.”⁵ The maximum quantity to be sold to each person was fixed at three seers: but, as it was found that this was evaded, and that the necessity of coming long distances for so small a quantity was a hardship, the maximum was raised to six seers. The rest of the rice was expended in gratuitous distribution at the relief centres and in village relief.

26. *Relief houses.*—The earliest subject that attracted the attention of the relief officers was the very unsatisfactory condition of the poor-houses or relief centres at which cooked food was distributed, but residence and discipline were not enforced. The views of the Famine Commissioners on the validity of the objections felt to this mode of relief have already been quoted (paragraph 13); but it seems clear that the prejudice felt by the people was extremely violent, that it was shared by the local officers, and was, to some extent at least, justified by the results. Before the beginning of the operations under the new system Mr. Webster, Assistant Collector at Cuttack, had reported that the test of cooked food was too severe.⁶

“The present system of giving cooked food to people who collect at a fixed place can only reach those who are reduced to the verge of actual starvation, as, until this point is reached, no Ooryah would on any consideration submit to the degradation which he considers is entailed by resorting to Umachatters. When once this point is reached, the chances of recovery are very slight indeed.”

When the new Relief Committee took charge of the work, they found about 43,000 people congregated at these relief centres. These persons had mostly belonged at first to the pauper class, but there were also many who had been in more respectable positions, and who, having been forced by famine to apply for food at these places, had lost their caste and been rejected by their relations, and had become altogether demoralised.⁷

there always must be in crowds of such a nature to depression of spirits owing to surrounding sights and offensive smells : and (3) the feeling of degradation that must, wherever degradation is possible, accompany such an accustomed way of living. The second objection is touched on by Colonel Smith in his Part II, paragraph 6, as "that mournful prostration so common among the helpless paupers of the "relief-houses." The objection I have to cooked food, even when cooked by Brahmins, is, that relief in such a form is not acceptable to many deserving of it, and that, in all other cases than where the system of large relief-houses is adopted, it is practically inconvenient. Indeed, such a method of distribution lays down that it is the duty of the relieving officer to relieve only the actually starving, or to compel a relinquishment of prejudice, rather than that it is their duty to find out the deserving objects and administer relief to them in the most acceptable way at their disposal. I need hardly say that where such ideas are entertained efficient administration of relief is impracticable."

To those who maintain that State relief ought never to be made attractive, and that the condition of the pauper receiving such relief ought never to be on an equality with that of the self-supporting labourer, it will appear probable that Mr. Kirkwood's objections to these institutions were partly due to his sense of their unpopularity.

Indeed, throughout his report, the necessity of establishing any test to keep off unworthy applicants, and the fear lest relief should be administered to those who are not in real need, are only mentioned to be rejected; and he insists strongly that the prejudices of caste are so deeply ingrained that it is no use struggling with them, since the people will perish of starvation rather than save their lives by abandoning them :

"Better rather the indiscriminate relief which during the late famine was administered by some of the native gentlemen in Calcutta, than the dread of imposition which would lead a well-intentioned official to restrict relief within certain narrow limits in order to satisfy himself that none who do not deserve participate."

At the same time it is fair to say, that the other two relief managers do not seem to have entertained views as hostile as Mr. Kirkwood's to these institutions. Mr. Rampini (Balasore) writes :

Para. 12.—"The principles on which I have endeavoured to regulate the distribution of this kind of relief have been (1) that the recipient should be incapable of manual labour, either from age, debility, or disease; and (2) that the recipient reside within the relief-house premises. I believe that, without insisting on these two rules, this species of relief will degenerate into an abuse, while that by a strict observance of them it may become the best and most efficient means of relieving actual famine. Some exception may, perhaps, be taken to the second rule, but experience soon shows that it is necessary to enable the officers in charge of the relief-house to carry out the provisions of the first rule, and to exercise due economy in the preparation of the meal; and, moreover, the little restraint imposed by a compulsory residence within circumscribed limits is found to be a most efficacious means of thinning from the relief-house mere vagrants and heggars and others unworthy of receiving relief.

Para. 13.—Much has been said against relief by distribution of cooked food, and there can be no doubt that it is open to the most grave objections. It is costly, it is demoralizing and degrading in its effects, it draws the people away from their homes, and their houses fall into ruins. Still, I would remark, it would seem to be a necessary evil in time of actual and pressing famine. I know of no other means of relief by which the lives of those dying from hunger can be saved. The provision of extended employment, sales of rice at low rates, and distribution of relief in villages of raw rice, are excellent means of averting or staying a coming famine; but I would say, to offer either of those kinds of relief to a starving person is but a bitter mockery, and that, therefore, in time of actual famine the Unemployment Committees are most necessary institutions."

Mr. Toynbee, relief manager in Puri, has the following remarks on this subject, which tend to show that the charges brought against these relief-houses were due more to their utter mis-management than to any inherent defects in the system :—

unfortunately no work of any kind, the paupers passed the greatest part of their time in searching for snails, sâg, or any other eatable rubbish which they could pick up. The inmates of the centres were composed of old or infirm men, and of women and children, with or without parents or friends. By far the larger proportion were women, unfortunate widows whom, in the struggle for existence in 1866, their relatives have been compelled to turn adrift to shift for themselves.

28. *Loss and recovery of caste.*—When the relief-houses began to be closed in September 1867, great anxiety was felt as to what would become of the outcaste paupers and how they would be treated by their relations and friends on their return to their villages. The learned Brahmins of Puri, Cuttack, and Calcutta were consulted, and gave their verdict that no one ought to be put out of caste for any act committed in order to save life; but that a payment of a few annas and the performance of some simple ceremonies should in any case suffice to restore him to his original position.

29. *Village relief.*—In place of the poor-houses thus discredited, relief was given by distributing raw grain to people at their own homes. The distributors were the special deputy-collectors and inspectors appointed for the purpose; they visited all the parts where suffering was most intense, and drew up lists of persons deserving relief; this was given either in money or clothing, or sale of raw rice at reduced rates, or the gift of a ticket on the nearest depôt, or of rice at the rate of 20 days' supply to last a month.²

Mr. Molony writes³—

"The original intention of calling for lists from the zemindars was abandoned and the Kanungos were required to prepare lists. These, however, were found of little use, and the lists prepared in the villages by the inspectors were preferred. The proposal to give to those only who were wholly incapacitated for work was also not strictly adhered to, and the plan of proportioning the amount of relief to circumstances of the people was substituted, by which means the women and children of numerous families were partially supported while the crop was being cultivated by the men, who otherwise have been obliged to abandon their homes to seek food at a distance,—a course which would have resulted in the breaking up of the house and family."

"No doubt the system was abused, and there were instances of such abuse in the issue of raw rice, in persons concealing their circumstances in order to receive more relief, in some persons obtaining tickets for relief at two different centres, in Sarbarakars, or headmen of villages, extorting money on pretence of securing relief tickets, in the police extorting money on pretence of tolls from ticket-holders on their way to take relief from the depôts, and so on; but, on the other hand, the distribution of relief in the villages produced many and obvious good effects. It opened out village stocks; it gave confidence generally; it saved many from the terrible death of starvation who were prevented by caste prejudices, or by the honest fear of shame and contamination, or by the unwillingness to break up the family home, from resorting for relief away from home . . . and above all, it brought back or retained the labouring population at their proper homes and their usual avocations; and so it tended more than any measure towards restoring the status quo of the province."

Mr. Toynbee reports that in Puri there had always existed a system of distributing raw grain and money to the poor inhabitants in the large villages where relief centres existed, and also in the khas or Government estates. This system was now enlarged. The district was divided into five circles, and three of these, in which distress was more severe, were placed under three deputy-collectors, and the regular system of house-to-house village relief was only undertaken in these circles. In the two other circles two officers gave relief to all those whom they met on their inspection tours who needed it. In the first-mentioned circles, each deputy-collector had three inspectors; these visited every village, gave tickets to those who seemed in need of relief, and informed the recipients of the day and place fixed for them to meet the deputy-collector and receive their rice. The deputy-collectors attended at fixed central stations, visiting on the way a village here and there to test the inspector's work: on the day of distribution, if the ticket-holder appeared a fit object for relief, he received his rice, and with it authority to draw a monthly supply from the depôts: if not apparently in need of help, his ticket was cancelled and further enquiry made. When all the circle had been visited in this way, the deputy-collector took to regular inspection of the relief measures, and cancelled the tickets, month by month, of those who appeared no longer to need help. Altogether they visited 969 villages in nine months and relieved 64,998 persons, the average relief given to each being 12 seers: besides which 4,722 persons got 6 annas ahead in cash.⁴

strangers." It is only fair to the officers concerned to state that all these obstructions were successfully overcome. The average quantity of rice given to each person was small; but it must be remembered that the larger portion of those relieved were aged or infirm people and children. In other cases, full subsistence allowance was purposely withheld, in order that the recipients might be compelled to do something for themselves to eke out the supply which they had obtained gratuitously; had they got more they would have been doubtless more contented, though less really benefited. Former inmates of Chutters, however, received a larger quantity, as their circumstances were entirely different."

In Balasore (where distress was less severe) Mr. Rampini did not consider it advisable to adopt this system at all. In Cuttack it was extensively practised, and Mr. Kirkwood considered it most beneficial; and "if the services of distributors, who will laboriously and conscientiously perform the duties entrusted to them, can be secured, it is a mode of relief open to comparatively little fraud." His report, however, contains little information as to the way in which it was carried out, but the general system was the same as described by Mr. Toynbee for Puri. It appears¹ that 5,858 villages were visited, and 137,770 persons received 10 seers of grain apiece, while 8,428 persons received 12½ annas each: but it is not shown how far these were different persons; and many of them must have been counted over and over again on each occasion when they received their monthly dole.

30. *Results of village relief.*—The total number relieved in this way was as follows;—

Month.	Numbers relieved in		Total.
	Cuttack.	Puri.	
March - - -	—	2,561	2,561
April - - -	—	3,385	3,385
May - - -	5,245	5,314	10,559
June - - -	12,968	14,582	27,550
July - - -	22,888	7,504	30,392
August - - -	44,857	14,225	59,082
September - - -	38,225	10,666	48,891
October - - -	15,344	5,970	21,314
November - - -	8,420	3,550	11,970
December - - -	73	1,963	2,036
Total - - -	—	—	217,740
Average of 10 months - - -	—	—	21,774

The cost of this relief is stated² as Rs. 1,73,880, which is made up of the value of 53,757 maunds of rice and Rs. 8,442 in cash. This would represent only Re. 0-13-9 per head if the recipients were all different persons who were relieved only once for all; but this can hardly have been the case.

31. *Light labour relief-works.*—Those who were fit to do any active work at all were employed on the light labour relief-works, and it was observed of the paupers who were drafted to them from the relief-houses³ that "the moment work in any suitable shape and to any forcible degree was given, their physical condition and discipline improved *pari passu*; those who were capable of a full day's labour were excluded from those works and sent to be employed under the Public Works Department or the Irrigation Company:" only those who were fit to do something, but were not fully able-bodied, were received on these works. It was no easy matter to start them or to keep them going.⁴

"In one instance they refused to work in them, and returned clamouring and threatening to the centre whence they had been drafted. In another instance they fled the centres where the system was being introduced, and flocked to other centres where it had not yet been introduced. Then, when they once were drafted into the light labour gangs, it was as well their object as the object of their overseers to keep them there, and thus many able-bodied labourers, whose services would have been available for full day's work to the Public Works Department or the East India Irrigation Company, were kept in comparative idleness and uselessness, and at higher rates on the light labour gangs; as for instance, on one occasion, at Bonomalipore, where in one day no less than 350 persons were found in the light labour gangs capable of doing a full day's work. And again on another occasion, when in the breaking up of a light labour gang no less than 3,000 persons were said to have sought employment on the Government embankment.

¹ R. C. page 220.

² R. C. p. XIV.

³ R. C. p. XIV.

⁴ *Ibid.*

"The system as a whole worked well; many persons in the centres were obviously and for a long period quite unfit for a full day's work. It was better, morally and physically, to give them light work rather than no work at all. As they became capable of light work, they were drafted out of centres, and the centres were to this extent temporarily, and at last permanently, thinned. In the light labour gangs they to some extent paid their own way, resumed their former habits of industry, and gradually regained health and strength. When capable of a full day's work, notice to quit was given: and they either disappeared of their own accord, or were drafted into regular labour, and so became merged once again naturally into the population."

32. *Adoption of the piece-work system and its results.*—The system on which they were employed was one of piece-work, but with the rates fixed so low, that it was impossible for any one, however infirm, not to earn a livelihood. "The relief committee contracted to do the work at so much per hundred cubic feet, but the workmen did not do a full day's work, and yet were paid rather more than the ordinary full day's pay either in money or rice." Mr. Kirkwood, who was the author of the system, thus describes it:—¹

"We have in the Cuttack district succeeded singularly well in the working of our light labour system, and have, with one or two unimportant exceptions, always given specific rates of payment. When a person in a very weakly state joins a gang, he has generally been given food or money sufficient to enable him to support himself for a few days. During this interval he does some work, little it may be, and earns something; this saving helps him to eke out the earnings of the next week. During the fortnight thus got through, he has probably gained sufficient strength to enable him to subsist on our rate without any extraneous aid. The rates were so as to be capable of sustaining the weakest; the weakest have invariably improved after a short time, and any other class than the weakest have been able to earn sufficient, in proportion to their strength, to subsist well, to buy clothing, and even to save." * * * "No matter what form gratuitous relief takes, it has in all but the worse cases somewhat of an enervating effect, or rather has not the tendency to raise the spirits and increase strength that manual work of some nature so emphatically has. The very effect of work does a wonderful amount of good. I think I may safely say that it has been found that when once a person gets into a light labour gang improvement begins; when into a relief-house (as often as not) deterioration."

The original orders, dated March 2nd, fixed the rate at 2 pice per ten cubic feet, or 5 annas per hundred cubic feet: and it was reckoned that a party consisting of a man, woman, and a child would do 75 cubic feet and earn $3\frac{3}{4}$ annas, of which $2\frac{1}{4}$ annas would be enough to feed them, and they would save $1\frac{1}{2}$ annas.² But very soon the rate was raised to 1 pice for 4 cubic feet, or $6\frac{1}{4}$ annas per hundred: and in July to 1 pice for 3 feet or $8\frac{1}{4}$ annas per hundred cubic feet. Mr. Kirkwood actually apologises for not raising it higher:³

"Any higher rate would only meet with increased laziness on the part of the workers. and, as experience has shown, a diminished outturn of work. The rate of 1 pice per 4 feet was a very suitable one, with rice selling at 12 seers per rupee."

"The work was of the nature of excavating canals, constructing embankments, roads, and such like. Allowing half a seer of rice to be sufficient to support a woman, we find that, with rice selling at 12 seers, if she could earn a daily wage of 3 pice she could subsist. To earn this at the rate of Rs. 3-13-6 she would have to do 12 cubic feet of earthwork. The weakest may in some cases have been unable to complete more than this; but the average work of the women employed was much nearer 20 feet, and this gave room for the purchase of salt and other necessities. Subsequently the price of rice fell to 16 seers and 20 seers per rupee, and more than mere subsistence became not only possible (it was possible before) but probable. I do not take into calculation the increased rate we gave during the rains, as that was merely a set-off against the days on which work was impossible and idleness compulsory."

The idea thus being that the wage should be so fixed that a weak labourer might be able to save part of it, it was not thought an objection that a moderately strong labourer who could dig 100 cubic feet in a day would receive six annas, or six times as much as was needed to support him. The system, liberal as it was, does not seem to have been effectual in stimulating the energies of the labourers, for an outturn of 20 cubic feet per diem would not be thought large⁴ on any relief-work where the daily wage system exists, except in a time of temporary disorganization.

In Balasore the attempt to enforce piece-work was less successful—⁵

"The people were at first found so utterly disorganised and unaccustomed to restraint that it was impossible to introduce a strict task-work system. The system of daily payments at the rate of

¹ G. pp. 91 and 92.

² R. C. p. XCII.

³ *Ibid.* p. 124.

⁴ In the North-Western Provinces, in the famine of 1877-78 (when earthwork was exceptionally hard), it was laid down that 1,000 cubic feet ought to cost Re. 1-6-6, if executed by able-bodied famine labourers, but that for the specially inefficient gangs double or treble this rate might be allowed. Six men, six women, and six children were to dig and carry 1,000 cubic feet, or on an average 55.5 cubic feet each: the inefficients might do half, or in an extreme case a third of this quantity. Thus it appears that a larger tale of work was got by the daily-wage task-work system in the North-Western Provinces than by the piece-work system in Orissa.

⁵ *Ibid.*, p. 165.

1½ annas for men, 1¼ for women, and 1 anna or ¾ anna for children, was retained for some time. Latterly, as a more efficient establishment was obtained, and as the paupers became more accustomed to labour and discipline, payment by task work was introduced, but as the gangs were weekly replenished by draftings from the centres, there was always a considerable number from whom only a very nominal work could be expected."

Mr. Toynbee's account of the system in Puri is still less encouraging—¹

Para. 10.—"The light labour system has not been, on the whole, a success in the Puri District, owing chiefly to the want of works of greater extent. In March there were about 1,500 people engaged in cutting drains through the sand on the daily labour system, but this relief was in reality gratuitous, as they did little or no work, and no return was obtained for what they did. It was undertaken for want of something better, and for the purpose of keeping the people from strolling about the town begging, after being denied admission to the chutters."

33. *Numbers employed and cost.*—The numbers employed on these light labour works were very few in Balasore and Puri—in Cuttack their maximum was 9,178 in May. The following table shows the monthly numbers :²—

	Cuttack.	Puri.	Balasore.	Total.
March - - -	2,145	—	2,331	4,476
April - - -	7,304	372	1,571	9,247
May - - -	9,178	372	1,455	11,005
June - - -	8,382	190	639	9,211
July - - -	6,301	664	661	7,626
August - - -	5,099	611	863	6,573
September - - -	3,067	603	855	4,525
October - - -	1,886	596	700	3,182
November - - -	881	256	205	1,342
December - - -	—	208	264	472
January - - -	—	—	290	290
Total - - -	—	—	—	57,949
Average of 10 months -	—	—	—	5,795

The total cost of these works was Rs. 1,45,216³, or Rs. 2-8 a head, for which sum, with rice at 12 seers per rupee, 30 seers, or a seer a day, could be bought; a more than ample provision for men, women, and children taken together. The value of the works done, estimated at Public Works Department ordinary rates,⁴ was Rs. 71,928, or nearly 50 per cent. of the cost.

34. *Ordinary labour relief.*—A large quantity of employment was also afforded to able-bodied labourers by the Irrigation Company, who were then pushing on their works, and by the Public Works Department, as well as by the importation and transport operations. The reports contain no information of the nature of the work, nor is it clear whether they were ordinary works paid for at the usual rates, or relief-works carried out on a special system. There is, however, a casual allusion to shew that the Irrigation Company were induced by Government to raise their rates in order to attract labour, and probably they were recompensed for this; the Public Works Department works too must have been much more extensive than are usually carried on in Orissa. The following table gives all the information that is to be obtained regarding this expenditure :⁵—

Work.	Outlay in 1867.
	Rs.
Irrigation Company - - -	6,07,400
Public Works Department - - -	8,42,548
Local Funds - - -	87,394
Total - - -	15,37,142

If we include the Rs. 72,645 paid by Government for light labour, we may safely reckon, excluding the outlay of the Irrigation Company, that Government expended 10 lakhs of rupees on wages of labour, besides a contribution given to the Irrigation Company, the amount of which is not known.

¹ *Ibid.*, p. 176.

² *G.*, p. 313a.

³ *Ibid.*, p. 89.

⁴ These rates, however, are extremely high, 4 annas per 100 cubic feet, and probably include other items besides the actual payments to coolies.

⁵ R. C., p. 29.

35. *Relief given by spinning and weaving.*—A very extensive amount of relief was also given to the respectable classes in spinning and to weavers in weaving. In Puri, cotton was given out and paid for when returned as thread at the rate of 12 annas a seer: thread was given to weavers, and they received 4 to 6 pice, or 12 chittacks of rice, for each yard of coarse cloth. In Cuttack, too, this system was successfully worked, and Mr. Kirkwood's set of rules¹ will be useful to any one in a similar position. The thread and cloth spun and woven in this way were sold to realise a considerable portion of the outlay: the gross cost was Rs. 216,261,² and the receipts from sale were Rs. 1,25,023, leaving a net expenditure of Rs. 91,138. For this sum a total number of 68,773, or an average number of 6,877, persons were supported for 10 months, costing Re. 1-9-3 per head monthly.

36. *Orphans.*—The number of orphaned or deserted children was extremely large: altogether 18,146 passed through the hands of the Committee, but the great majority of these died deserted, or were reclaimed by their relatives. At the end of December 1867,³ there were 1,487 orphans in the hands of guardians selected by the Relief Committee. After considerable discussion it was decided that if any parents or other fit guardians of the children came forward to claim them, they should receive charge of them: but in default of these the committees were to make the best arrangements they could, and generally this ended in their being taken care of in Missionary orphanages. The Government undertook to grant Rs. 3 a month for the maintenance of the children till they came to the age of 16 for girls, 17 for boys, receiving in return the balance in the hand of the Relief Committee, which amounted to nearly the sum which these payments were calculated to cost, Rs. 2,50,000. A passage in Mr. Kirkwood's report shews not obscurely the misery from which these children were rescued by their reception into orphanages—

Para. 61.—“The mortality among the orphans has been very great. In many cases they arrived with constitutions frightfully shattered by the starvation and exposure they had undergone, and died shortly after they reached the orphanage. The health of the orphans has, however, considerably improved during the late cold weather. There are now about 800 orphans—300 boys and 500 girls—at the missionaries' orphanages; these are the residue of a number nearly double; the others have died, run away, or been reclaimed. But even the number of 2,000 cannot represent one tithe of those whom the famine has robbed of their natural protectors. Doubtless many have sought and found refuge among relatives; but the fact that there are known to be some 200 female orphans in the town of Cuttack, who are being trained in the homes of prostitutes for a career of immorality, points with some clearness to the fate of a by no means inconsiderable number.”

On this Mr. Molony writes⁴—

Para. 27.—“But it is to be remembered that Cuttack, with the exception of perhaps Balasore, is the only town of considerable importance in the Province, and cannot, therefore, be taken as an index of the extent of such adoptions. I do not think the circumstances of the districts in 1867 were such as to warrant a presumption that selling or giving children for the purposes of prostitution was largely prevalent. The attention of the Government was drawn to the circumstance alluded to by Mr. Kirkwood by a prosecution (unsuccessful) against a woman of the town for keeping two children received during the height of the famine, and a proposal was submitted to redeem some of the younger children, about thirty-five in number, by paying compensation for their support, and handing them over to the missionaries, who were willing to receive them; but it was considered undesirable to interfere with the children of a more mature age, above eight or nine years, as their presence in the orphanages would be obviously undesirable. The matter is still under the consideration of Government. Any funds the Committee might pay in compensation for the rescue of these children would be well laid out.”

37. *Miscellaneous relief.*—These are the principal forms which the administration of relief took. There were, however, some minor measures which deserve to be recorded. Attempts were made to provide for the settlement of the homeless paupers in new localities.⁵

Para. 21.—“In Puri it was at one time proposed to give a bonus to zemindars for every bonâ fide pauper they would take from the centres and settle comfortably on their lands, but this scheme never met my approval. It was likely to prove very expensive, and afforded no sufficient guarantee that the settlers would not return. The sum proposed was Rs. 10 per head; only 50 people were thus settled, and they, I believe, did not return to the centres. Another scheme was tried in the Government estate of Khoordah, in which the Commissioner took a great interest, viz., the formation of a new pauper village. Everything was prepared for the people, a crop put into ground, and houses built for them, and they received rations until harvest time. I believe the experiment, though manifestly a most profitable one for the settlers, has not completely satisfied them, and has been very expensive to the estate.”

¹ G., pp. 122-6.

⁴ R. C., p. 6.

² G., p. 119.

³ R. C., p. XX.

⁵ *Ibid.*, p. 5.

Money also was given for thatching and repairing ruined houses, and in 36 villages Rs. 3,000 were given to buy seed-grain;¹ "but here again the Committee could not be sure that the relief accorded had actually been given, or had been without filtration." No attempt seems to have been made to help agriculturists by giving them bullocks, or artisans by the gift of the implements of their trade and a little capital to start with.

38. *Receipts and Expenditure of Relief Committee.*—The accounts of the Relief Committee were never made quite clear, but the nearest approach to an accurate statement of these is the following:²—

RECEIPTS.		EXPENDITURE.	
	Rs.		Rs.
Balance of former relief fund - {	27,530	Establishment and buildings -	1,44,859
	5,542	Poor-houses and transport of grain - - -	1,17,032
Subscriptions in 1867 -	6,14,503	Light labour - - -	1,36,106
Sale of rice - - -	3,34,669	Spinning and weaving -	1,52,742
Sale of thread and cloth -	1,23,324	House-to-house relief -	8,448
Sales and miscellaneous articles -	38,234	Orphanages - - -	73,088
Received from Government as value of light labour -	72,645	Miscellaneous - - -	13,518
	<u>12,16,447</u>	Unaccounted for ³ - - -	94,874
		Transferred to Government in payment for rice and for prospective charges of orphans	4,60,785
			<u>12,16,447</u>

39. *Remissions of revenue.*—The policy pursued this year as to remission of revenue was very different from what had been considered suitable in the preceding year. The entire demand due in November was remitted throughout the Province, and in all cases where the December crop had been less than half an average one, the zemindars were excused payment of the rest of the revenue demand of the year (due in April). In this way Rs. 15,84,391 were remitted.⁴ There was further a considerable loss of revenue from salt and excise, due to the poverty of the people. Taking into consideration the normal regular increase which would have occurred, the Accountant General estimated the loss thus⁵:—

	1865-66.	1866-67.	Total.
	Rs.	Rs.	Rs.
Loss in excise - -	3,00,000	9,00,000	12,00,000
Do. salt - -	20,00,000	5,00,000	25,00,000
Do. land revenue -	--	15,84,391	15,84,391
Total - -	23,00,000	29,84,391	52,84,391

40. *Disposal of the surplus stock.*—When the Relief Committee closed their operations on the 1st April 1868, it was necessary to decide how to dispose of the stock of rice in hand, which, according to the latest accounts, stood at 6,17,642 maunds. Some of this was stored at the landing places in "import golahs," some inland at "sale golahs." The Board and the Local Government agreed that it would be unwise to sell it all; a considerable quantity should be kept in hand, as a precaution to meet any unforeseen contingencies, and to keep down the exactions and unjust demands of monopolist traders; and it was at first decided to retain 5,00,000 maunds massed in the central and seaside golahs, and to sell off the balance in the scattered inland golahs. The Commissioner, however, represented that if any such necessity should arise as was anticipated, it was at the up-country golahs that grain would be needed: and moreover he showed that there was no local demand for consumption as the supply of home-grown rice was abundant, that no large traders existed in the country who would buy the

¹ R. C., p. XXII.

² Compiled from G., pp. 308, 309, 311, and 312.

³ It is perhaps to this item that Sir G. Campbell referred in Mr. Bernard's letter of December 11, 1873. "In the Orissa famine, for want of some such arrangements," as a special Audit and Account Department, "over a lakh of rupees on one account alone had to be written off as unexplained or irrecoverable."

⁴ This figure is taken from the Bengal Government's reply (Mr. Toynbee) to the Famine Commission, p. 51.

⁵ G., p. 304.

Government rice there to carry it down to the sea and export, and therefore they had better sell the stocks collected in the most accessible parts, i.e., in the "import golahs." He further stated that the attempts to sell at Re. 1-8-0 for Calcutta, and Re. 1 for Burmah, rice had been unsuccessful, and he proposed to sell at Re. 1 and Re. 0-12-0 per maund, respectively, but to be allowed discretion to reduce the rates still lower. This was granted, but it took the whole of 1868 and 1869 to dispose of the rice on these terms, and all this time it was rapidly deteriorating and expensive establishments were kept up to look after it. At the end of 1869 the balance in hand was still 81,019 maunds, and it was sold by auction for what it would fetch. The sum obtained from this rice appears to have been Rs. 4,37,625; so that the value obtained was about eleven annas a maund. The grain cost Government Rs. 4-9-0 a maund.

41. *Board's attempt to clear up its account of the expenditure.*—The entire accounts of the expenditure and receipts of this famine appear to be in such a state of hopeless confusion that it is impossible at the present time to arrive at any absolute certainty about them. The Board of Revenue, the Government of Bengal, the Public Works Department, the Relief Committee, and the Treasury Department all kept up independent and discrepant sets of accounts, and no attempts were made to lay down any system of recording and auditing them in such a way as to bring them to a single head or to reconcile them with each other. In May 1868 the Board of Revenue sent up the following statement of expenditure:—

In 1866.					Maunds.	Co-L. Rs.
Grain imported	-	-	-	-	4,02,449	20,54,339
Cash relief	-	-	-	-	-	5,17,141
Total expenditure	-	-	-	-	-	25,71,480
Received—						
Sale of grain to public	-	-	-	-	95,655	4,02,592
To Relief Committee	-	-	-	-	2,12,502	1,10,217
Stock in hand	-	-	-	-	64,066	2,08,274
Total	-	-	-	-	-	15,23,083
Net Expenditure, 1866	-	-	-	-	-	10,48,397

In 1867.

The Accountant General's statement, on the other hand, showed an expenditure of Rs. 81,05,340, or Rs. 7,56,761 in excess. This discrepancy no efforts could reconcile, and the attempt was abandoned. As to the *per contra* receipts no attempt seems even to have been made. The note drawn up in December 1872 gives the following account of the disposal of the rice :

	Maunds.	Cost. Rs.
Imported in 1866	3,99,269	
„ 1867	10,55,825	
Total	14,55,094	69,48,640
Sold to Government and the public	8,16,426	10,64,439
Made over to Relief Committees	6,06,607	
Wastage and loss	32,061	
Total	14,55,094	

But the Accountant General records Rs. 14,68,335 as recovered by sale of grain in 1866 and 1867, which agrees pretty nearly with the sums with which the Board had debited themselves in 1866 and 1867, as has been seen before at the beginning of this paragraph.

To this must be added the sales of 1868, 1869, and 1870, which brought in Rs. 4,37,625 more, making a total of Rs. 18,92,719.

42. *Attempt to sum up the accounts.*—In any case it is clear that the Board's figure is wrong; but whether we deduct their receipts from their expenditure, or the receipts as stated by the Accountant General from the expenditure as stated by him, the net outlay was over 62 lakhs of rupees. Besides these sums expended by the Board, we have the expenditure on Public Works and on private charity. The accounts may therefore with some probable approach to accuracy be summarised thus—

	Rs.
Expended by the Board of Revenue on rice importations and local purchases of rice	81,05,340
Deduct sales of rice	18,92,719
Balance net expenditure on rice	62,12,621
Expenditure on Public Works in 1866 (paragraph 20)	2,49,983
„ 1867 (paragraph 34)	10,00,000
Gratuitous relief. Public subscriptions—	
In 1866 (paragraph 20)	4,69,600
In 1867 (paragraph 22)	6,14,500
North-Western Provinces Famine Fund	6,17,805
	71,64,512
Add loss by salt, excise, and remission of revenue (para. 39)	52,84,391
	1,44,48,803

Out of this sum a surplus of about two lakhs of rupees remained unspent, but it was taken over by the Government to meet the charges for the maintenance of the orphans; so that more than the whole of this sum was really expended on the relief of the famine, inasmuch as the Government incurred larger charges for the orphanages than the fund it took over; and also the contribution to the Irrigation Company has not been reckoned in. But taking the figure as it stands, it appears that five rupees a head was spent on the relief of the famine-stricken people of Orissa.

43. *Conclusions as to the famine management of 1867.*—It is a melancholy reflection that while a larger sum of money was spent on this famine than had ever been spent before, it should be associated in history only with the memory of a greater mortality than had ever been recorded. But the cause of this is not hard to find. The measures taken in 1867 were a violent reaction from the policy of 1866: and no expenditure was thought too large to incur in shutting the stable door, although the steed was irrecoverably lost. The officers who administered the charitable funds were mainly impressed with the necessity of forcing relief upon the people and making it so attractive to them that no one could refuse it: and hence the cost of this relief was abnormally large. Whether in the relief-houses, on light labour, or in the employment given to spinners and weavers, the wages and the food amounted to far more than a bare subsistence allowance, and there can be little doubt that many were tempted by these high rates to accept relief who were not in absolute need. So again no experienced

person can read the account of the village relief system without seeing that the officials were too few and too new to the work, and the time was too short for them to acquire any real knowledge as to the condition of the people who clamoured for relief; they were obliged either to accept all comers, or to be guided by the rudest of all tests, that of outward appearance, in their admissions and rejections. Still, the destruction of property and comfort, and the moral shock to the whole population in the preceding year, had been so terrible that there can seldom have been a country in which the employment of tests to keep off the undeserving was less necessary; and though many who were relieved cannot have been in severe want, they can hardly have been altogether free from want. The main evil of this lavish and somewhat indiscriminate relief became evident in the tone both of the public and the official mind in 1873 when, with a far less serious calamity to the crops, the same determination was shewn to make relief pleasant and acceptable, and the same ruinous system was adopted of paying the pauper at a higher rate of wage or food than could be earned by the independent labourer.

As to the policy of importing grain, it seems to have been mainly a mistake. Mr. Schaleh's investigations were, as has been seen, of the most summary and superficial character: his estimates of the area and population of the inundated tracts, and of the extent of the injury done to the crops, were but rough approximations, and his calculation that the crop saved would supply food for only half the population of those tracts was a guess which was proved erroneous by the event. No information seems to have existed as to the extent to which private trade was active, or could have been stimulated to activity. The resolution to import grain seems to have been come to as if that had been the universal practice of all time, a proceeding which required neither defence nor argument; and it is so accepted by the local officers, who assume that it is the only way in which the necessities of their relief measures can be supplied. It is very probable that some measures were inevitable to place supplies ready for the carrying on of charitable and labour relief; but it never seems to have occurred to any one to enquire whether the required quantity could not have been supplied by the process of giving advances to trading firms on the spot rather than by the expensive agency of Government officers. In any case it is clear that the quantity imported was enormously in excess of what was required. The Relief Committee used less than a third of the million maunds imported at so great a cost; of the rest a small quantity only was sold to a necessitous public, and the balance had to be parted with for next to nothing. Of the total sum spent in 1867 on this object, at least two-thirds, or 28 lakhs of rupees, were absolutely thrown away. It is important to bear this lesson in mind, and to remember how certain Government is, when it enters into a transaction of this kind, to enter into it at a tremendous loss; not only because Government officials are unaccustomed to the business of handling, transporting, and dealing with grain, but also because they are sure, if they aim at safety, to overpass the limit, and to err on the side of excess. It cannot be said that no occasion can arise when Government ought to import grain; but the case must be very rare, and the necessity should be fully proved, before it ventures on an undertaking which must be expensive and may be unnecessary.

SECTION II.—BEHAR AND NORTH BENGAL.

Compiled from report by Mr. F. R. Cockerell, 15th March 1867 (गुगल ३३ "C").

length by 5 to 8 miles in breadth, which was swept by a hailstorm and its whole crops ruined in February 1866), a portion of Shahabad and Gya, where rice is the main crop, and a considerable area of Monghyr and the Santhal country. The following table was compiled by Mr. Cockerell¹ to show the area and estimated population of the famine tract, and a rough estimate has been added for Bhágalpur and Santhalia :—

District.	Total Area.	Estimated Population.	Population by Census of 1872.	Area of severe Famine.
1	2	3	4	5
Tirhut - - -	6,114	1,856,000	4,385,000	3,000
Champáran - - -	3,781	870,000	1,440,000	1,700
Sarun - - -	2,612	1,200,000	2,064,000	700
Shahabad - - -	4,403	1,602,000	1,724,000	1,204
Gya - - -	5,689	1,367,000	1,950,000	1,360
Monghyr - - -	3,592	844,000	1,813,000	1,316
Total - - -	26,191	7,739,000	13,376,000	9,280
Bhágalpur - - -	4,327	—	1,826,000	1,000
Santhalia - - -	5,488	—	1,259,000	1,200
Grand total -	36,006	—	16,461,000	11,480

A comparison between columns 3 and 4 shows what difficulties the local officers had to contend against in making an approximation to the resources and needs of the country : their estimate of the population of their districts was hardly more than half the truth.

2. *Causes which led to the famine.*—The crops of 1863 had been poor in Tirhut, but those of 1864 were extremely bad over all this part of the country. The rainfall was deficient in quantity and closed early, none falling in October ; and thus not only the main rice crop suffered, but the rabi area was small. A brisk export was at the same time draining away the stocks of the country ; the following statistics are given² regarding it :—

From	To	Period.	Amount in Tons.
Calcutta - - -	Bombay - - -	May 1864 to April 1865 -	291,000
Behar and N. Bengal	N.W.P. - - -	Jan. 1864 to Dec. 1865 -	108,000
Calcutta - - -	Foreign ports -	May 1864 to April 1865 -	616,000
" - - -	" - - -	May 1865 to April 1866 -	309,000
" - - -	" - - -	May 1866 to Dec. 1866 -	109,000

The result of this export was that the average price at 13 important markets in Eastern Bengal (not in the famine tracts) rose as follows :—

September 1864, 27 seers per rupee.³
 " 1865, 20 " "
 " 1866, 11 " "

The outturn is estimated by Mr. Cockerell at from two-thirds to one-third of an average. In 1865 the character of the season was the same⁴ as it had been in 1864,—late rain in June, floods in July, and a total cessation of rainfall in September. In Tirhut, the crop "did not exceed in the Northern Parganas a quarter of the outturn of an ordinary year, and in other places showed a considerable deficiency."⁵ In the north-eastern and northern parts of Champáran the rice harvest failed entirely (though the early or bhadoi crop had been fair).⁶ In Sarun the Collector reported that the rice crop had failed to the extent of two-thirds, and the rabi crops (including a great deal of opium) were entirely destroyed in the tract of the hailstorm of February 1866.⁷ In the bad parts of Shahabad the rice crop had failed to the extent of five-eighths to three-fourths of an average outturn in both 1864 and 1865.⁸ In the famine tract of Gya the rice crop failed completely in 1864 ; the rabi of 1865 was very bad, and the rice crop

¹ Paragraph 150.

² C, paragraph 130.

³ Paragraph 131.

⁴ No figures showing the rainfall actually gauged are given in the report.

⁵ Paragraph 9.

⁶ Paragraph 32.

⁷ Paragraphs 51–52.

⁸ Paragraph 66.

of 1865 failed, but the extent of failure is not stated.¹ In Monghyr "the crop of 1864 failed to a considerable degree"²; nothing particular is stated regarding that of 1865. In the northern part of Bhágalpur we read of the "complete failure of the rice crop."³ These estimates of loss were based on the best local opinions formed at the time, but are no doubt excessive.⁴ Subsequent experience and the most careful investigations have shown that a loss of one-third of the crop of a single year is enough to cause great distress, and the loss of one-half amounts to famine. No country has ever been able to withstand the loss of two-thirds of its crop without a degree of suffering similar to that experienced in Orissa; and any such failure for two consecutive years would lead to the almost complete depopulation of the country.

3. *Brief history of the famine.*—The earliest indications of the approaching calamity were given by the rapid rise of prices that occurred when the deficiency of the monsoon was established. The collectors, for the most part, took alarm in October and November 1865, and reported their fears of impending famine and organised local relief committees, following the course laid down in the Board's report of November, which is referred to in the preceding section.⁵ In all cases, however, the ripening of the winter rice in December relieved the tightness of the markets and gave employment to the poor: the funds raised locally were small, and were soon exhausted. The winter rains were unusually abundant, and the rabi crop (so important in Behar) was quite a good one except in limited tracts destroyed by hail.⁶ From this time there was a period of apparent lethargy on the part of Government officers. The police reported numerous cases of deaths from starvation, and crime of a kind peculiarly connected with hunger became very common: but no notice was taken of these indications of the prevalent suffering. In April prices again rose considerably; and in May the Commissioner of Patna called on his collectors to take measures to relieve distress. On this, relief committees were again appointed in each district in June; subscriptions were collected, and grants made in addition to them by Government; a large number of relief-centres were opened; food was distributed to the helpless and infirm gratuitously, and work offered to those who could do any labour, however small. In July these measures began to be in working order, and in August as many as 37,000 were relieved daily. The rains, however, were timely and abundant, and the early bhadoi harvest almost put an end to the distress: a small number of paupers however remained on the hands of Government till the rice crop was cut, in December.

4. *Prices.*—The following table shows what is recorded as to the prices of rice at the head-quarters of the affected districts. It is not, however, quite clear what kind of rice is referred to.⁷

—	Tirhut.	Champáran.	Saran.	Shahabad.	Gya.	Monghyr.	Bhágálpur.
September 1865	- 14—9	15	11½	—	10 —7	15 —12	16½
October "	- 14—9	15	10	—	10 —7	11 —10	13½
November "	- 13—9	15	13 —7½	13½—12	15 —9	15 —10½	11½
December "	- 14—9	11	14½—9	13½—12½	15 —9½	13 —9½	11½
January 1866	- 15—9	12½—12	14 —9	13½—12½	14 —9	13 —10	15
February "	- 14—8	10½	13½—10	14 —12	13½—12½	11 —8	13½
March "	- 13—9	10½	13½—7	13½—12	13 —10½	10½—8	13½
April "	- 10—8	9½	12½—7	11½—9	10½—9½	9 —8	12
May "	- 9—7	9½	11½—7	10½—10	10 —8	9 —8	11½
June "	- 9—7	8½	10½—7	10 —8½	9½—7½	8 —7	10
July "	- 7—6	8½	10 —6½	10 —9	9½—7½	7½—7	8½
August "	- 7—5	6½	10 —7	12 —9	8 —6½	7½—7	8½
September "	- 10—17	12½	12½	14 —10½	9½—8½	7½—7	8½
October "	- 9—8	16½	13	14½—14	10 —9	8½—7	10
November "	- 14—9	18½	14	15½—18	13 —9	9 —8½	12½

¹ Paragraphs 73 and 76.

² Paragraph 89.

³ Paragraph 101.

⁴ Taking the first six districts alone in the table in paragraph 1, and applying to them the statistics contained in Mr. MacDonnell's book, we find—

Population	- - - - -	11,563,000
Annual food consumption	- - - - -	2,891,000 tons.
Cultivated area	- - - - -	9,117,000 acres.
Produce of an average year	- - - - -	3,995,000 tons.

Half the average produce would not feed the population, and if for two years running half the crop were lost, there would be a deficiency of 1,800,000 tons, which must either be supplied by food stocks or importation; or 7 millions of the population must die.

⁵ See paragraph 4, Orissa.

⁶ Minute by Sir G. Campbell, dated 25th November 1873, B.B.I. 59.

⁷ Thus Mr. Cockerell says (paragraph 33) that in October in Champáran the commonest rice sold at 9 seers; the table on pp. 44—5 says 15 seers. In Gya "only 7 seers of rice could be purchased for one rupee, in October" (paragraph 74); the statement shows 10 to 7 seers. Similarly, for Bhágálpur two prices are given: 11 in paragraph 102, and 13½ in the tabular statement for October 1865.

The highest price reached was in Tirhut, where rice ranged at 7 to 5 seers per rupee; and at this time it could only be procured with great difficulty, both in the north of Tirhut and of Bhágalpur. The relief committee of the latter place purchased rice at wholesale rates and sent it out for retail sale in local markets; but in no other district was this found necessary, as the import trade was active throughout the period of distress, and Government interference in importation was not called for.¹ One alleviation of the scarcity was the abundance of the mango crop: in Purneah, in spite of the great demand, 100 mangoes sold for one piee.²

5. *Mortality*.—Cholera broke out in all the affected districts in August (except Patna and Bhágalpur), and was very fatal: there was the usual difficulty in discriminating between its symptoms and those of famine dysentery. But, independent of this epidemic, the health of the people was very bad: in the few hospitals in which registration was properly kept up, out of 3,440 patients received during the worst months, 1,632 died within eight days of their admission. The police returns of persons who died by starvation or diseases connected with famine were not very accurately made or carefully examined at the time; but the number amounted altogether to 135,000.³

6. *Crime*.—There was a singular outburst of crime in the early part of the year 1866, which mostly took the form of arson, villages being set on fire in order to take advantage of the confusion to plunder the grain-pits. In Tirhut⁴ in the four months March to June 613 such cases were reported, the average of previous years not having exceeded 200 in the whole year. In Champáran it was calculated that incendiarism had been at work in 90 per cent. of the villages of the entire district.⁵

7. *Classes that suffered*.—The classes that felt the famine most severely were the professional beggars, the helpless and infirm, petty village artisans, agricultural labourers, and, above all, the "Noonahs," or saltpetre-makers, whose trade had lately been destroyed by the extinction of the manufacture and export of this article. The ryots, as a class, got through the hard times successfully, only dispensing with hired labour.⁶ The landowners sustained no material losses: they neither received any remissions from Government nor made any to their lessees. In the Raja of Darbhanga's estate alone was a portion of the rent⁷ (6 per cent. of the whole) remitted to the cultivators.

8. *Conduct of landowners*.—On this subject Mr. Cockerell speaks in terms quite as strong as those used by Sir George Campbell in the Orissa Report. "The landholders generally may be said to have practically ignored their obligations and responsibilities in this crisis.⁸ There was a marked want of co-operation on the part of the native landholders and wealthier classes with the authorities."⁹ And he sums up thus:¹⁰—

"As a body, they have in a great measure ignored the responsibilities and obligations of their position under the permanent settlement. There have been individual instances of their distributing food indiscriminately and on a very small scale; but there has been no such open-handed liberality as the occasion called for, except in the few cases previously recorded in this report; they took no action for the relief of the general distress, either in the way of applying their own means in combination to that object, or exerting their influence to induce the wealthier portion of the community, with whom their example and persuasions would have had weight, to bear their share of the burden of maintaining the starving people. Nor can they be said to have responded readily to the appeal of the Government officers to their sympathy with their distressed fellow-countymen, or to have afforded reasonable support to the public relief measures, either by contributing largely from their own resources or giving their personal aid towards the supply of a suitable agency for the distribution of food."

"The total amount subscribed in all the above mentioned districts was Rs. 1,29,293-15-7; and this sum includes the contribution of all officers of Government and others who have no property in those districts. The Government revenue derived from estates situated in localities where the failure of crops and local distress were greatest is Rs. 32,79,942. Now, as the amount of the Government revenue demand in these districts, where the land-revenue assessment is light, does not, on an average, exceed one-fourth of the zemindar's receipts from his property, it will be seen from this comparison how little the landed proprietors contributed in proportion to their means, or to the amount annually derived from that portion of the country in which the incidence of severe distress operated with the most disastrous effect; and it was only in the very few instances specially mentioned in the foregoing narrative that the zemindars or landholders were found willing to undertake the superintendence of the distribution of food at the relief-centres and employment of those able to labour."

¹ C, paragraph 149.

² Paragraph 109.

³ Paragraph 151. Mr. Geddes however states (p. 302) "the accuracy of the mortality statistics rendered by the police officers to Mr. Cockerell was subsequently contested by the local officers, the Commissioner, and Board of Revenue."

⁴ Paragraph 11.

⁵ Paragraph 36.

⁶ Paragraphs 13, 135, 136.

⁷ Paragraph 137.

⁸ Paragraph 27.

⁹ Paragraph 45.

¹⁰ Paragraphs 139, 140.

9. *Emigration.*—There are a few notices of emigration. In February 1866 the population of Northern Tirhut “commenced deserting their homesteads and migrating¹ southwards in large numbers”; and in Gya upwards of 3,000 persons registered themselves for emigration beyond sea.² But, speaking generally, the pressure seems not to have been severe enough to drive the people to adopt this resource.

10. *Relief-works; system pursued.*—The relief measures adopted by Government officers were of two kinds: special works for those able to labour, and gratuitous feeding for those unable. The relief-works were not carefully planned and laid out beforehand, in spite of the long warning the officers had before the stress came upon them: they were not opened till the rains set in, at which time earth-work can hardly be usefully carried on; and though this form of relief was “better as regards its moral influence than the mere giving of food gratuitously,” Mr. Cockerell points out³ that—

“for the lakh of rupees expended in these districts in the nominal employment of a large number of persons on public works, there is but a very small return, owing partly to the weak condition of those so employed, and the season at which the work was carried on; and that, had the money been expended some months earlier in the employment of the people on works of public utility, numbers would have been saved from either falling into the condition of helpless paupers or perishing through want. Real work would have been obtained from those employed; and the districts in which the money was so expended would have derived no inconsiderable permanent benefit.”

11. *Result obtained.*—The wages given on these works were 6 pice in Champáran and Monghyr for an adult and 3 for a child; 9 to 3 pice in Shahabad on some works, and an average of 5 pice a day on others; 6 to 4 pice in Patna and Bhágalpur. Nothing is on record as to what attempts were made, or on what system, to compel them to labour; but, evidently, the results were almost *nil*. The following figures show the numbers employed and the cost of this form of relief:—

	June.	July.	August.	September.	October.	November.	December.	Total.	Total Cost.	Cost per head.
									Rs.	R. A. P.
Tirhut - -	583	461	220	182	79	61	—	1,586	2,008	1 4 3
Champáran - -	667	2,338	1,869	1,846	—	—	—	6,720	11,469	1 11 4
Sarnu - -	206	2,440	1,766	1,672	3,005	3,616	1,747	14,452	22,600	1 9 0
Shahabad - -	—	1,218	868	1,662	559	44	52	4,403	7,027	1 9 0
Gya - -	117	117	123	195	317	317	317	1,508	5,944	3 15 0
Patna - -	969	1,167	1,399	2,111	2,111	1,372	—	9,129	16,305	1 12 0
Bhágalpur - -	—	280	441	250	223	254	221	1,669	4,584	2 12 0
Monghyr - -	—	—	838	1,049	1,382	517	—	3,786	8,170	2 2 6
Santhalía - -	727	1,411	823	338	86	24	—	3,409	18,773	3 8 0
Total - -	3,269	9,432	8,347	9,305	7,762	6,205	2,337	46,657	88,882	2 1 5

13. *Number and cost.*—The following table gives the numbers relieved gratuitously and the cost of relief:—

	June.	July.	August.	September.	October.	November.	December.	Total.	Cost.	Average Cost per head.
									Rs.	R. A. P.
Tirhut - - -	3,775	6,788	11,621	6,856	4,435	2,481	695	36,651	37,440	1 0 4
Champāran - - -	2,450	4,228	3,648	3,129	—	—	—	13,455	12,982	0 15 6
Sarun - - -	1,480	5,621	4,919	3,824	800	141	—	16,785	21,708	1 4 6
Shahabad - - -	—	990	3,415	3,727	2,008	976	330	11,446	19,618	1 12 4
Gya - - -	436	1,085	1,057	1,146	379	90	—	4,193	6,696	1 10 0
Patna - - -	—	—	1,522	2,919	2,399	1,883	1,197	9,920	9,926	1 0 0
Bhāgalpur - - -	—	248	708	1,019	676	—	—	2,651	8,287	3 2 0
Monghyr - - -	—	—	1,058	2,201	1,774	—	—	5,033	7,048	1 6 0
Santhalia - - -	—	94	1,034	1,321	447	200	58	3,154	7,444	1 6 0
Total - - -	8,141	19,054	28,982	26,142	12,918	5,771	2,280	103,288	1,31,149	1 4 0

The average number relieved was 14,755 for the seven months that charity was given; or looking only at the four worst months, it was 25,822 daily during that period.

Bhāgalpur paid far the highest for its relief; but, except in this district and Shahabad, the cost of relief was hardly sufficient to provide sustenance for a starving person at the prices then prevailing.

14. *Remedial measures for the future.*—Mr. Cockerell's report concludes by advocating three classes of remedial measures to provide against a future famine: they were—

- (1) irrigation works;
- (2) means of communication.

As regards both of these much has been done already, and the subject is discussed elsewhere more fully.

- (3) "The creation of a special agency to collect accurate information in regard to the population, agricultural produce, and state of trade throughout the province." On this subject he says:—

"164. As before remarked, many lives might have been saved, and the extreme severity of the distress greatly mitigated, if not altogether prevented, by the adoption of relief-measures at a much earlier period; that the administration of relief was not sooner undertaken is due to the district officers' want of acquaintance with the condition of the people. This want of information on the part of district officers is more or less general, and must, I think, in a great measure continue so, as the necessary condition of our existing local administrative system, by which details are sacrificed to the principle of extreme centralisation.

"168. Under an efficient administrative system, the chief revenue-officer of the district ought to have full information as to the extent and exact nature of the cultivation of the entire revenue paying lands; the incidence of the assessment fixed by the permanent settlement upon the several estates within the district, as shown in its practical operation in the division of the produce of the land between the State, the proprietor of the land and the cultivator, and the consequent effect of such partition upon the condition of the population and the wealth of the district. He should know, further, the extent of the population, the numerical strength of the classes into which it is divided, their requirements in the consumption of food, the sufficiency or insufficiency of the local produce to meet such demand, and the extent to which the supply is ordinarily supplemented or diminished by the action of an import or export trade.

"169. To acquire this statistical information, not as it may apply simply to one particular period but in respect of its variation from year to year and season to season, a special subordinate agency is required, through which the collector or chief revenue-officer could obtain reports of changes in the extent of area under cultivation, the condition of the crops, the demand for and supply of labour, the ruling prices of food and wages of labour, the result of each harvest in the out-turn of grain, the proportion of it finding its way into the market, and the condition of import and export trade and its effects on the local market.

"171. * * * The functions of the proposed department would be to take a census of the population of each district, to keep an accurate registry of the classes into which the population is divided (this would not, of course, contain the names of individuals but the number of the population of each class), and to submit for publication reports of the prices current, the state of the crops, estimates of the probable out-turn of produce, and the quantity of each kind of produce imported to and exported from each district.

"Through the same agency a general system of registration of births and deaths might be introduced. * * *

Since these remarks were written, a census has been taken, and the incorrectness of the general opinion as to the population has been exposed; but Bengal is as far off as ever from possessing a cadastral survey or any accurate knowledge of its cultivated area and the out-turn of its crops.

15. *Summary.*—The following is a summary of what has been said as to the amount and cost of relief given. Taking the number of sufferers from severe famine at a third of the population of the affected districts, or $4\frac{1}{2}$ millions, the cost of relief was 10 pie per head:—

Measures.	Average Number relieved.	Period.	Cost to Government.	Cost to Public.	Total Cost.
Relief Works -	11,660	4 months	Rs. 98,054	Rs. —	Rs. 98,054
Gratuitous Relief	25,822	4 months	855	1,30,294	1,31,149
Total -	- -	- -	98,909	1,30,294	2,29,203

SECTION III.—MADRAS.

Based on Mr. Dalrymple's Report on Madras Famines.

*Brief Sketch of the Famine.*¹—The seasons of 1864 and 1865 were both unfavourable (though in Madras itself the rainfall of 1865 was normal, and not much below the average), but the first warning was given from Ganjam in October 1865. Information was given to the public of the high prices, and merchants began to export rice there, the Acting Collector being forbidden to import for Government. He reported in November that though crops were bad, there was no real scarcity, and the district had produced enough for its own food. In consequence of importation, prices fell again, and no more alarm was felt till the end of January 1866, when Mr. Forbes returned as Collector to his old district, and found the state of things very alarming, and that deaths from starvation had already taken place. In February, the Board reported that the prospects of the season were bad in almost every district; but when further enquiries were made, in March and April, no Collector expressed alarm for the future, except those of Salem and South Arcot. In Ganjam, relief-houses were opened in February and March, and subscriptions solicited from the public; a relief-work was opened in April, but the large work which the Collector proposed, the excavation of the Chilka Canal, was not sanctioned for want of budget provision. In April, the Collector reported starvation deaths to be frequent, and in May the distress became more acute, and Government despatched a large supply of rice by steamer, besides granting considerable sums of money. In June, distress became more wide-spread as the rains held off, and agricultural employment was at a stand-still; and in July the alarm became general. Deaths from famine were reported in Bellary, and prices rose everywhere. The Governor (Lord Napier) visited Ganjam, and a Relief Committee was appointed in Madras. Government agreed to contribute for gratuitous relief a sum equal to the subscriptions of the public, and ordered relief works to be opened near Madras. Lord Napier wrote a gloomy account of the condition of the people in Ganjam, but said there was plenty of fodder, as repeated showers had fallen, and cattle were thriving. In North and South Arcot Mr. Ellis, who was sent on a visit of inspection, found a large number of emaciated people in the relief-houses, but the general state of the population he thought good. The Central Relief Committee distributed their funds to the different districts, to be expended in cooked food, raw grain, or doles of money at the Collector's discretion to those unable to labour. If the rains had fallen in June, Mr. Dalrymple thinks the scarcity would have abated at once, but they held off, and the relief operations, which were delayed in the hope of rain and on economical grounds, came too late. Prices rose still higher in August, but in that month rain fell in Ganjam, and prospects

improved, and all over the Presidency the north-east monsoon was abundant, and distress began to pass off in October and November.

2. *Effect of the Famine on Prices, Trade, Crime, Emigration, and on the different Classes.*—The following facts are gleaned from the replies of District Officers to the Circular of the Relief Committee:—

Prices.—At Coimbatore, rice sold in September 1866 at $4\frac{1}{2}$ seers, in Salem at $5\frac{1}{2}$ seers, and in parts of North Arcot and Trichinopoly at 6 seers. Ragi was at one time selling at $7\frac{1}{2}$ seers in the hill tracts of the Salem District. In September, ragi sold in Bellary at an average price through the month of about 12 lbs. per rupee (against 41 lbs. the previous year), and rice at $8\frac{1}{2}$ lbs.; in Coimbatore and Salem, rice fetched $10\frac{1}{2}$ and 14 lbs., respectively, per rupee. In Ganjam the highest recorded price was that of August, $15\frac{1}{2}$ lbs.

Exports and imports by sea were not affected, about a million cwt. of food-grain being exported as usual, and the imports were rather lower than the average (8,15,000, against 11,00,000 in 1865–66, and 14,00,000 in 1864–65). Hence Mr. Dalycell draws the conclusion that high prices were due to local scarcities, not to general deficiency. In spite of high prices and distress in North Arcot, 10,000 tons were exported thence by rail to Mysore, &c.

Grain merchants, afraid of being forced to sell at a fixed price, or being looted, sent their grain away to another market usually, when prices rose very high in their own town.¹

As to the time when distress reached its maximum, this was for Ganjam early in the year; for Bellary not till July; for other districts, Salem, North and South Arcot, Coimbatore, in August and September. After October, prices fell steadily everywhere, except in Madras, where they remained high till February 1867.

Classes.—The non-agricultural classes suffered most; also persons on low fixed salaries, and Musulmans. In Ganjam, the ryots suffered severely, and as they would not take cooked food, uncooked grain was issued to them. In November, 24,000 were fed in this way. Ryots in zemindary estates suffered more than Government ryots. Mr. Forbes reports very severely on the conduct of the Ganjam zemindars.

Emigration.—Mr. Forbes reports that many emigrated from Ganjam to the south and to Sambalpur, and 800 coolies emigrated by sea to Mauritius.²

Crime.—In every district grain thefts and robberies greatly increased. The offenders were chiefly low castes, driven to crime by want. Cattle were slaughtered, specially in the smaller and unprotected villages.

3. *Mortality.*—In Ganjam it is estimated³ that 11,000 perished of starvation, and in one part of the district 10 per cent. of the people. Registration of deaths only began in the Presidency in June 1865, hence the statistics are not worth much; in Bellary a death-rate of 4 per cent. was registered against 1·5 after scarcity was gone. The average of the Presidency was 1·63 per cent. for the last six months of 1866, against ·87, ·88, and ·77 in the two preceding and the following periods. Hence it may be estimated that double the usual number died, or say 200,000 in excess.⁴

4. *Relief Measures.*—Many relief-houses were maintained by zemindars, rich ryots, and native gentlemen at their own expense.⁵ The system approved by the Committee was that of distributing a meal a day to persons collected in an enclosure, admission to which was given by tickets. No residence was required; they were seated in rows and obliged to eat the food there, none to be carried away. The quantity is not specified, “as much was given to each as he could reasonably require.” The food was rice on Sunday, cholam and ragi porridge on other days. In Ganjam,⁶ though uncooked rice was given to cultivators and the respectable classes, all others were fed with cooked food in order to “check the number of applicants, which would have been unlimited had merely a distribution of uncooked rice been adopted.” All comers were admitted into the enclosure, and “some person in authority then went round and ordered all who seemed undeserving of relief to leave.” When the funds at the Committee’s disposal

¹ Page 107.—This seems a forced conclusion from Mr. Ellis’s report, which is to the effect that, though prices might be high at home, they would send grain away to other places where it was higher rather than raise prices to the same high rate at home and incur odium.

² Geddes’ Admin. Experience, p. 234.

³ D., p. 112.

⁴ But the true mortality of 25 millions at 35 per millo is 875,000 or 437,000 in six months. The excess should therefore be about 450,000.

⁵ D., p. 114

⁶ Mr. Forbes’s report, quoted by Mr. Geddes, p. 157.

became large two meals a day were given. About 100 seers of rice and ragi mixed were usually found "sufficient to feed from 200 to 250 people, varying according to the proportion of children to adults, and the physical condition of the recipients." In Salem and North Arcot cooked food was sent to Mahomedan women in distress by their male relatives. In rare instances small doles of money were given. Mr. Ellis adds,¹ "I heard natives of all classes speaking in terms of approbation of the system pursued in affording relief to the aged and infirm, and I concur in the opinion unanimously expressed in these districts, that these houses of relief have been the means of saving many lives." In fact, except in the case of Ganjam, there is no trace in these reports of any extreme dislike on the part of the famine-stricken to receive cooked food. Large remissions of revenue were given, and public works opened wherever employment was needed by the able-bodied. But the appended table shows that though the necessity was fully recognised in July it took some time to organise the measures, and they were not in full working in Bellary and Coimbatore² till September :—

TOTAL NUMBER relieved in the PRESIDENCY.

Months.					Gratuitous Relief.	Relief-works.	TOTAL.
February	-	-	-	-	584	—	584
March	-	-	-	-	737	—	737
April	-	-	-	-	1,547	150	1,697
May	-	-	-	-	2,535	425	2,960
June	-	-	-	-	5,647	783	6,430
July	-	-	-	-	21,367	1,572	22,939
August	-	-	-	-	82,045	6,529	89,474
September	-	-	-	-	93,053	13,999	107,052
October	-	-	-	-	100,359	16,552	116,911
November	-	-	-	-	79,729	18,268	97,997
December	-	-	-	-	56,587	25,614	82,201
January	-	-	-	-	27,620	33,019	60,639
February	-	-	-	-	14,049	28,890	42,939
March	-	-	-	-	6,951	21,435	28,386
April	-	-	-	-	4,656	8,828	13,484
May	-	-	-	-	3,913	5,393	9,306
June	-	-	-	-	—	968	968
TOTAL					502,279	182,425	684,704
Average for 16 months					31,392	—	—
Average for 17 months					—	—	40,276
Average for 15 months					—	12,162	—

¹ Mr. Forbes's report, quoted by Mr. Geddes, p. 161.

² For district details see table on the next page.

DISTRICT DETAILS showing the NUMBERS in receipt of RELIEF in 1866-67.

	ON GRATUITOUS RELIEF.												ON RELIEF WORKS.												Total number employed.	Cost of gratuitous relief.	Cost of Public Works.						
													Total number on relief.																				
	February 1866.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	January 1867.		February.	March.	April.	May.	June.															
Bellary -	-	-	-	-	-	3,613	15,935	28,693	32,310	19,938	15,590	10,158	0,743	5,019	3,301	3,113	144,433	-	-	-	-	-	-	-	-	-	-	-	-	114,646	Rs. 1,06,708	4,47,540	
Karnul -	-	-	-	-	-	-	-	-	2,082	2,130	1,489	1,564	321	108	-	-	7,777	-	-	-	-	-	-	-	-	-	-	-	-	4,449	11,720	13,016	
Salem -	-	-	-	-	-	592	6,493	6,966	6,530	4,879	3,545	856	272	-	-	-	30,135	83	639	936	644	322	373	427	306	35	-	-	-	3,782	21,593	27,537	
Colombatore -	-	-	-	-	-	-	629	1,538	1,740	1,902	1,378	1,261	789	657	-	-	9,820	-	26	609	1,182	1,237	916	490	112	5	-	-	-	4,601	11,798	19,145	
North Arcot -	-	-	-	-	-	-	8,133	8,114	8,021	5,806	3,590	964	-	-	-	-	33,019	-	1,491	2,032	2,950	2,703	5,000	5,000	-	-	-	-	-	29,952	27,150	1,00,000	
South Arcot -	-	-	-	-	-	84	1,436	2,333	1,779	1,576	1,356	1,017	-	-	-	-	9,610	8	725	927	839	1,103	368	636	4	-	-	-	-	4,845	7,490	15,910	
Trichinopoly -	-	-	-	-	-	-	2,500	4,166	3,016	300	-	-	-	-	-	-	9,982	-	-	-	172	39	46	45	43	43	315	4,964	930	-	-		
Madura -	-	-	-	-	-	-	4,313	5,375	5,540	4,893	4,203	3,407	2,071	1,077	1,353	800	32,033	-	-	-	67	310	6,101	5,313	739	763	21,021	19,408	-	-	-		
Malabar -	-	-	-	-	-	2,813	24,091	3,507	231	271	-	-	-	-	-	-	30,991	-	112	328	209	125	-	-	-	-	-	-	-	775	19,270	5,738	
Madras District	-	-	-	-	-	-	-	-	210	200	290	290	100	-	-	-	1,270	-	-	-	-	-	-	-	-	-	-	-	-	-	1,430	-	-
Madras Town -	-	-	-	-	-	-	1,372	2,818	3,506	4,271	3,569	3,833	3,607	-	-	-	22,838	-	-	-	-	-	-	-	-	-	-	-	-	-	38,004	-	-
Tanjore -	-	-	-	-	-	3	115	4,771	7,579	3,923	3,183	2,183	-	-	-	-	21,087	-	-	-	-	-	-	-	-	-	-	-	-	-	17,911	-	-
Gaujam -	584	737	1,547	2,535	5,747	14,210	17,874	25,292	27,672	30,535	17,801	1,555	146	-	-	-	116,445	1,481	513	498	331	361	-	-	-	-	-	-	-	4,562	210,909	8,968	-
TOTAL -	584	737	1,547	2,535	5,617	21,667	28,915	33,033	1,00,369	70,720	50,587	27,630	11,049	9,051	4,658	3,013	502,279	783	6,220	13,999	10,562	18,938	25,614	28,890	21,155	9,828	5,233	938	132,125	5,08,068	6,60,562	-	

the east, and did not dissipate itself till it had reached Farukhabad, Mainpuri, and the eastern districts of Rohilkhand. All the country that felt its beneficial influence revived, and not only reaped a moderately fair kharif crop, but sowed its rabi under favourable conditions. West, however, of the line thus drawn, through Bareilly southwards, little or no rain fell. The kharif, though not burnt up with dry west winds (for the wind was from the east all August and September, and was moist though hot), gave a very poor yield; and the soil was mostly too dry to sow the rabi without artificial irrigation. The winter rains, which were rather behind time, not falling till the end of January and the beginning of February, were abundant when they came; and the crops which had survived till then on dry lands benefited greatly. In Rohilkhand, however, and the trans-Jumna the area sown was small, and these parts continued to suffer till the crops of the next rainy season were ripe.

On the 11th December the Lieutenant-Governor issued an appeal to public charity, and appointed a Central Committee at Allahabad to receive and distribute subscriptions; but on the 17th February, prospects having improved so greatly through the fall of rain and the large importations, he issued a notice that subscriptions would no longer be required. The continuance of high prices, however, prolonged the distress in an unexpected manner; and it was not till the rain crop was nearly ripe that warning was given that all poor-houses would be closed in a month's time. In effect, the famine came to an end in October: all poor-houses and relief-works were closed by the end of that month.

3. *Statistics of rainfall.*—The following is a statement of the rainfall in the affected districts:—

District.	1st June to 30th September.		1st October to 31st January.		1st February to 31st May.		1st June to 30th September 1869.
	Average.	1868.	Average.	1868-69.	Average.	1869.	
1	2	3	4	5	6	7	8
Saharanpur -	31·10	12·5	1·95	2·2	3·72	5·5	15·6
Muzaffarnagar -	28·12	11·1	1·71	1·0	3·32	5·2	16·4
Meerut -	24·20	13·5	1·17	2·9	2·72	2·9	12·8
Bulandshahr -	24·01	11·	1·56	1·1	2·02	1·8	13·9
Aligarh -	21·53	11·8	1·60	1·0	1·87	1·8	17·1
Bijnor -	32·14	19·5	1·71	2·1	3·28	3·7	25·2
Moradabad -	34·18	16·4	1·66	1·4	2·94	2·6	20·7
Budaun -	29·55	11·9	1·67	·8	1·40	1·3	17·4
Bareilly -	36·67	24·4	2·02	1·1	2·78	1·9	29·2
Shahjahanpur -	32·75	16·5	2·23	1·0	2·61	·8	21·5
Muttra -	24·55	12·1	·99	1·1	1·47	1·9	15·1
Agra -	23·87	12·2	1·12	·8	1·42	1·0	19·2
Farukhabad -	27·21	11·	2·07	·5	1·37	·6	18·5
Mainpuri -	26·53	8·8	2·06	1·1	1·36	·9	22·3
Etawa -	25·21	12·4	2·04	·9	1·34	1·5	23·1
Etah -	24·76	10·8	1·24	·9	1·55	1·2	18·1
Cawnpore -	25·84	15·	1·78	·4	1·37	1·0	24·6
Fatehpur -	28·29	17·4	1·83	·2	1·0	1·0	24·8
Allahabad -	32·76	24·	3·46	·1	1·36	·5	27·7
Banda -	32·0	20·7	1·87	·2	1·14	1·5	28·2
Hamirpur -	31·92	15·5	1·65	·5	·88	1·2	28·8
Jalaun -	29·49	11·8	1·13	·0	·80	1·4	25·4
Jhansi -	32·25	14·5	2·13	·5	·92	·9	37·8
Lalitpur -	37·10	11·3	1·36	·8	1·65	·9	39·5
Ajmir -	21·09	6·2	1·31	·1	1·31	1·1	16·9
General average -	28·52	14·1	1·72	·9	1·82	1·7	22·3

Columns 2, 4, and 6 are taken from the Meteorological Report for 1876.

Columns 3, 5, 7, and 8 from Mr. Henvey's Report, Appendix II.

4. *Area and population of the famine tract.*—The following table shows the area and population of the famine tract of 1863-69, divided into its three main portions:—

Dist.	District.	Population by census of 1872.	Cultivated area.	Irrigated area.	Dry.	Kharif.		Rabi.	
			By Administration Report, 1888-89.		Acres.	Ratio of loss.	Loss of food grains, in maunds.	Ratio of loss.	Loss of food grains, in maunds.
			Acres.	Acres.					
Acre's (South-west corner).	Lahore	218,000	213,000	21,000	210,000	1	750,000	1	230,000
	Jhansi	257,000	117,000	22,000	325,000	1	1,100,000	1	915,000
	Total	695,000	600,000	43,000	611,000	—	1,850,000	—	1,145,000
Seven (Trans-Jumna and west half of Rohilkhand).	Jaloun	102,000	600,000	18,000	581,000	1	1,000,000	1	880,000
	Randa	721,000	500,000	8,000	581,000	1	1,500,000	1	1,300,000
	Hammur	321,000	752,000	13,000	739,000	1	1,320,000	1	1,100,000
	Muttra 1	460,000	350,000	50,000	500,000	1	1,100,000	1	110,000
	Agra 1	771,000	600,000	250,000	550,000	1	2,120,000	1	1,150,000
	Bijnor	631,000	371,000	53,000	511,000	1	1,010,000	1	1,220,000
	Moradabad	1,095,000	808,000	137,000	972,000	1	1,120,000	1	1,220,000
	Barilly	1,781,000	1,012,000	211,000	768,000	1	1,100,000	1	1,180,000
	Total	5,080,000	5,558,000	1,055,000	1,533,000	—	11,150,000	—	8,510,000
Slight (Kash and east half of Rohilkhand).	Saharanpur	625,000	782,000	162,000	620,000	1	1,380,000	1	1,110,000
	Muzaffarnagar	602,000	650,000	315,000	707,000	1	1,110,000	1	720,000
	M. erut	1,200,000	1,031,000	578,000	153,000	1	1,210,000	1	500,000
	Bulandshahr	800,000	775,000	321,000	155,000	1	910,000	1	450,000
	Almora	225,000	905,000	260,000	81,000	1	1,050,000	1	500,000
	Muttra 1	100,000	350,000	155,000	25,000	1	170,000	1	110,000
	Agra 1	277,000	210,000	155,000	201,000	1	270,000	1	310,000
	Fatehpur	631,000	550,000	235,000	615,000	1	150,000	1	510,000
	Aligarh	1,200,000	900,000	315,000	615,000	1	360,000	1	800,000
	Muzaffar	1,051,000	813,000	201,000	628,000	1	610,000	1	720,000
	Budon	800,000	920,000	311,000	311,000	1	9,230,000	—	7,650,000
	Shahjahanpur	1,017,000	1,583,000	3,517,000	1,811,000	—	22,250,000	—	17,405,000
	Total	10,105,000	9,531,000	3,516,000	9,093,000	—	—	—	—
	GRAND TOTAL	16,750,000	14,800,000	3,516,000	9,093,000	—	—	—	—

This area corresponds very closely with that of the famine tract of 1860-61; and if it is more extensive, the reason is chiefly because more districts which were only slightly affected have been included in this than in Colonel Baird Smith's list. But the centre of the calamity has been displaced, and, instead of lying along the banks of the Jumna, it has been removed south-westward.

5. *Estimate of the loss caused by the drought.*—An attempt has been made to show the degree of protection which each district received from its means of irrigation, and the amount of loss it suffered. The latter estimate is very problematical, being made so long after the event. An estimate was made, however, at the time as to the average and actual rabi outturn. To this an estimate of the kharif outturn has been added, which is based on the reports sent up at the time, and corrected here and there in the light of subsequent events. The outturn of the kharif in the famine tract was, according to this estimate, about three-fifths and of the rabi three-fourths of an average crop. The loss is estimated at 22,250,000 maunds in the autumn and 17,500,000 maunds in the spring crop, or altogether 39,750,000 maunds, being a year's food for nearly nine millions of people. The value of this at ordinary, not famine, prices (reckoning kharif grains to sell at 31 and rabi at 20 seers), is Rs. 6,47,00,000, or a loss of nearly 6½ millions sterling. And this is independent of the loss in non-food crops, covering 1,700,000 acres, which can hardly be put at less than two millions sterling. The food-crop that was raised in the two harvests I estimate at 80,000,000 maunds, or more than 5 maunds per head of the population of the affected districts—a quantity just sufficient for food and seed-grain, had it remained in the province and not been drained away by a sharper demand elsewhere. As to the amount of irrigation (the figures for which are

taken from the Administration Report of 1868-69), it is obvious at a glance to what cause the districts in the slightly affected part owed their immunity. They suffered as much from the inclemency of the skies as the Rohilkhand districts did, or those on the southern border of the Jumna; but they were largely helped to surmount their difficulties by the aid of wells and canals. In the worst tract the irrigated area is only 7 per cent. of the whole; in the medium tract it is 19 per cent.; in the slightly affected it is 43 per cent.

6. *Comparison of 1860-61 with 1868-69.*—Comparing this famine with that of 1860-61, the general conclusions seem to be as follows. The failure of the south monsoon was not so complete, and a smaller proportion of the kharif crop was lost: the outturn of the rabi also was much larger. Moreover, the years preceding this drought had been better than the years 1859 and 1860. But the area of the famine was far greater. Instead of receiving supplies from the Punjab and Central India, the Province was drained of its stocks by the demands of those countries as well as of Rajputana, and only received supplies from Oudh and Bengal. Thus the area of high prices was enlarged, and the period during which they lasted was prolonged. Instead of emigration proving a refuge to the suffering population, the province received a vast number of immigrants from the more severely famine-stricken neighbourhood, and these added to the scarcity and to the mortality. But on the whole, except in Lalitpur and Jhansi, the famine, though wasting and prolonged, was not so acute in the North-Western Provinces as that of 1860-61.

7. *Prices.*—The following statement shows the average price of wheat at the seven principal stations¹ in the most affected part of the province, month by month:—

		Seers per Rupee.				
July	1868	-	-	-	-	23
August	"	-	-	-	-	19.9
September	"	-	-	-	-	18.8
October	"	-	-	-	-	13.14
November	"	-	-	-	-	12
December	"	-	-	-	-	11.13
January	1869	-	-	-	-	12.12
February	"	-	-	-	-	12.12
March	"	-	-	-	-	12.13
April	"	-	-	-	-	14.3
May	"	-	-	-	-	11.4
June	"	-	-	-	-	13.11
July	"	-	-	-	-	11.13
August	"	-	-	-	-	10.6
September	"	-	-	-	-	10.5

Wheat was much cheaper than it had been at the beginning of the drought of 1860-61, and it never went up quite as high as it did in 1861; but it continued high over a much longer time, and it was not till the end of 1870 that it fell to 20 seers per rupee again. The fall in April and May was due no doubt to the effects of a fair average harvest; but the continued drain to the west carried off the surplus supplies, and reduced the stocks so dangerously low, especially in Rohilkhand, that there was for a short period, in August and September, a panic of alarm and a revival of distress, although the rains were abundant and favourable, and an excellent crop was fast approaching maturity.

8. *Mortality.*—Putting aside Ajmir, which falls under Section I. of this abstract, there were few deaths admittedly due to the famine in the North-Western Provinces. This was the natural effect of the order holding the district officer responsible that no such deaths occurred. In the Bijoor district the number of such deaths was believed to be about 3,000 to 4,000; in Jhansi 218 were reported; and in Lalitpur 500. But the mortuary registration of the province, imperfect as it then was, still showed the great increase in mortality which, as it is now well known, always accompanies, not famine only, but scarcity and high prices. The number of deaths registered in 1868 was 319,886, or 10.8 per mille; in 1869 it was 529,753, or 17.9 per mille, an excess of 210,000 deaths. There was an increase of 53,000 under cholera, 73,000 under fever, and 60,000 under small-pox. The Sanitary Commissioner (Dr. Planck)² pointed to the insufficient and unwholesome food as a principal cause of the deaths attributed to fever. As the number registered in 1868 was only a third of the number that really died, and

¹ The complete details of the price-currents are to be found in Mr. Henvey's Appendix X., pp. XXXIX—LXII, from which this abstract has been made. The seven stations chosen are Meerut, Aligarh, Moradabad, Bareilly, Muttra, Agra, and Jhansi.

² Paragraph 9, Sanitary Report for 1869.

e same deficiency probably existed in 1869, the excess mortality of that year cannot have been less than 600,000.¹

9. *Loss of cattle*.—The loss of cattle was very large in some parts, and special returns were called for, according to which more than 1,150,000 cattle perished in the drought. But there were no data by which the ordinary death-rate could be separated from the excess mortality due to drought. Mr. Henvey² suggests, with hesitation, that 500,000 pairs of plough-cattle may have perished, which is a good deal larger than Colonel Baird Smith's estimate (300,000 pairs) of the losses of 1860.

10. *Crime*.—The country was as free from violent crime as in 1861, but, as then, there was a great increase in the number of petty thefts and robberies, which rose from 43,000 in 1867 to 63,000 in 1869. Cattle thefts alone fell off: cattle were not worth stealing in a year of drought.

11. *Classes that suffered*.—It was generally observed that it was not the agricultural classes who suffered in 1869, but the field-labourers, the village artizans, the poor urban

		3 Census of	
		1865.	1872.
Jhansi	-	357,442	317,826
Lalitpur	-	248,146	212,628

population, and, above all, the weavers. In Lalitpur and Jhansi, however, the prosperity (always doubtful there) of the agricultural community received a severe blow. Many emigrated who did not return; the population had fallen off considerably³ when the census of 1872 was taken as compared with the census of 1865, and much cattle died. Recent reports have

stated that these two districts have never since that year regained any degree of prosperity, but have gone on from bad to worse.

12. *Relief measures adopted by the people*: (1) *Emigration*.—Of the three methods usually adopted by the Native public to meet the distress caused by drought,—emigration, irrigation, and importation,—the former, emigration, did not come into play to any great extent, because the North-Western Provinces were so much less affected than the neighbouring territories, that they formed an asylum of refuge to the more afflicted residents of Bikanir, Marwar, Gwalior, &c. Only from Jhansi and Lalitpur a certain number, following immemorial custom, set out themselves in search of plenty to Malwa. Eventually, those who did not perish by the way,—a scanty remnant,—returned on finding that Malwa was involved in as deep suffering as their own country.

13. (2) *Irrigation*.—The second natural remedy,—irrigation,—was employed with the utmost assiduity. The canals, which had only irrigated 730,000 acres in the famine of 1860-61, and which, under all the outlay and extension of distributaries that had gone on since then, had never reached a higher figure than 983,990 acres, in 1868-69 supplied

¹ Henvey, p. 113.

The details were thus given in the Irrigation Report of the year:—

	Acres.
Ganges Canal - - -	1,078,399
Eastern Jumna Canal - -	274,101
Dun Canal - - -	14,223
Rotilkhand Canal - - -	70,803
Bijnor Canal - - -	3,052
Bundelkhand Lakes - - -	1,340
Total - - -	1,441,918

water to 1,441,890⁴ acres. An attempt was made to encourage cereals at the expense of some food-crops like indigo and sugarcane,⁵ but it does not seem to have had much effect. Altogether 1,178,558 acres were under food-crops, and may be roughly estimated to have produced 14 million maunds of food, or enough to feed 3½ millions of people for a year. The irrigated area of the famine tract, as calculated in the table in paragraph 4, is 4,816,000 acres. Deducting the canals, we have 3,374,000 acres irrigated in ordinary years by wells, ponds, and rivers. The latter sources of supply

are nowhere very abundant in the North-Western Provinces, and in a year of drought would fail almost entirely; we shall probably be safe in deducting⁶ the odd 374,000 acres on this account, leaving 3 million acres watered by wells. Half this area, or 1½ million acres, would be under a rabi crop in one year; the other half would be under kharif crops, and in a year when rain fails well-irrigation can do little to replace the deficiency for those crops, as they require too much and too frequent a supply of water. But, looking to the rabi or spring crop alone, we have 1,500,000 acres irrigated by wells, or a slightly larger area than that under canals, and producing at a rough estimate 18 million maunds, or food for 4½ millions of people. Thus, out of the population of the famine tract, 16¼ millions of people in the North-Western Provinces, food for 8 millions, or almost a half, was supplied by the irrigated lands of the province. In making this

estimate, it has been assumed that only normal industry was applied and an average outturn obtained. But there is evidence that the industry shown was very abnormal; that the resources of the wells were stretched to the utmost; that second crops were taken off the land after the ordinary crop had been reaped, and that special attention was paid to the putting down quick-growing crops producing large quantities of food. Carrots are pre-eminently such a crop; and it is recorded that many thousand acres were planted with carrots in the Bulandshahr and Aligarh districts.

14. (3) *Importation*.—Trade was exceedingly active in its efforts to meet the wants of the country; but the amount of exports and imports were not so registered or brought together as to make it possible to show with certainty what amount of food-grain was carried into the distressed districts, and from whence it came. Oudh poured in great quantities into Rohilkhand, and sent $1\frac{2}{3}$ million maunds (50,000 tons) to Cawnpore. Bengal sent 800,000 maunds of rice by rail; and altogether the line carried $4\frac{1}{4}$ million maunds, or 150,000 tons, in the first half of 1869. On the other side, from Cawnpore Agra, and Muntra together, $1\frac{1}{2}$ million maunds of grain were exported by road to Central India, and about three-quarters of a million were carried by rail to the Punjab. The river and the canal were also very actively employed in the carrying trade. For about two months, from 13th January to 15th March, the Government caused the rates of railway freight for grain to be reduced, thus forcing the railway to give a bounty on the carriage of grain, compensation¹ for which was paid to them. According to Mr. Henvey's report² there are no data for any conclusion as to the effect this bounty produced: whether it was pocketed by the trader, or was passed on to the consumer in a lowered price, or whether it had the effect of at all stimulating a trade which was already so active and vigorous. Grain was also exempted from tolls at ferries and octroi-barriers, and the compensation paid to the toll-collectors amounted to Rs. 25,086.

15. *Relief measures adopted by Government*.—The measures adopted by the Government (Sir William Muir was then Lieutenant-Governor) resembled closely those taken by Sir G. Edmonstone in 1860-61. In July, when the monsoon threatened to fail, a warning circular was sent out to district and canal officers; the people were to be stimulated to make the best possible use of the canal water, and to dig wells wherever practicable, and plans were prepared for useful relief-works. Later on, when the extent of the loss was better known, the means adopted for meeting it were those of relief-works and gratuitous relief. In reckoning what was done under these heads it will not be necessary to relate the system adopted, except so far as it differed in any respect from that already described as adopted in 1861.

16. (A.) *Relief works. Principles laid down*.—The principles laid down by the Government of India in the orders of 26th September 1868 were mainly as follows. Money wages, as a rule, should be given, calculated as being just sufficient to buy the necessary quantity of food. The rates commonly given on former occasions had been—

Men	-	-	-	$1\frac{1}{2}$ annas.
Women	-	-	-	1 anna.
Children	-	-	-	$\frac{1}{2}$ anna.

If more than this was ever given (the orders did not contemplate giving less), care should be taken that a full day's work was given in return. Wages should be paid daily, huts provided where necessary, and arrangements made for proper supplies of food. Task-work (or, as it is now called, "piece-work," "the payment depending directly on the quantity of work done,") was discouraged as rarely possible. "It is essential that enough to support life shall be given, whatever be the physical powers of the labourer; and all that can be expected is to take reasonable precautions to prevent deliberate idleness or refusal to work." Minor district works might be carried on by district committees; larger works should be taken up by the Public Works Department; and all such works should be of permanent utility.

17. *Difference between system of 1860-61 and 1868-69. Encouragement of minor local relief-works*.—The main point on which there was any practical difference in the system of carrying out relief-works was that they were much more numerous than in 1860-61. In that famine ten large works were opened, and the famine-stricken, generally speaking, were expected to go to them. Minor relief-works were carried on under

¹ This compensation amounted to Rs. 6,50,000. As the imports benefited the Punjab and Central India as well, Mr. Henvey has debited the North-Western Provinces with half the amount, or Rs. 3,25,000: vide paragraph 31. The rate was reduced to $\frac{1}{2}$ of a pic per maund or nearly $\frac{1}{2}$ d. per ton per mile, which is believed to be approximately the actual cost of carriage. (See Resolution, Government of India, P.W.D., 28th October, 1873.)

district officers, but to a very limited extent, and the labourers on them were paid in cooked food. This restriction was now abandoned. In twenty districts works were opened, often several in one district, under the Civil Officers; and these appear to have had their usual effect of attracting many who were not in actual need of relief. In Agra (Henvey, p. 24) it was reported that "the very poorest people were not employed. About four-fifths belonged to neighbouring villages; many of them were wives of the poorest classes sent to work by their husbands, who themselves earned wages in the fields." The principle adopted was that those who were fully able-bodied should be sent to the larger works; those who were feeble or unskilled, but still able to do some labour, should be employed on the minor works; but, as usual, it was found impossible to give much effect to this distinction. Besides these minor local relief-works, eight large and important works or sets of works were carried on by officers of the Public Works Department. Three of these (the Agra Canal, three out of four of the Rohilkhand Canals, and the Meerut drainage works) were not specially famine works, though the employment offered was a great relief to local distress, but were carried out in the ordinary departmental way by contracts. The rest were specially devised and arranged for the relief of famine labourers who were drafted on to them, sometimes from great distances, by Civil officers, and who received daily wages. In two cases,¹ towards the end of the famine, the system of petty contracts or piece work was introduced and worked with much success, care being taken at the same time not to make this system imperative, but to provide daily labour gangs for the infirm and feeble, who could not earn a subsistence at piece work rates.

18. *Value and cost of labour on relief-works.*—It was on this occasion that the principle was first laid down that the actual value at ordinary rates of every relief-work should be estimated and debited to the work, the excess cost due to the employment of unskilful or feeble labourers being charged as famine expenditure. In accordance with this ruling,² out of Rs. 18,61,020 expended on such works, Rs. 5,34,382, or 30 per cent., was thus debited to famine, the balance, or 70 per cent., being the actual cost of the works. This proportion naturally varied much in different cases, and it was best in those works superintended by professional agency. The following details are gleaned from Mr. Henvey's report. In Bijnor³ (district roads and clearing the Nagina Canal) the waste is said to have been fearful. In Budaon⁴ (9 district roads) the earthwork cost Rs. 2-1 per thousand cubic feet. In Hamirpur⁵ 52 miles of road cost Rs. 988, instead of Rs. 260 per mile, the total cost being Rs. 51,380, and the value Rs. 13,520. In Banda⁶ the different works (roads and a new tank) cost from Rs. 3-4 to Rs. 9-6 per thousand cubic feet. In Mirzapur⁷ the roads cost from Rs. 460 to Rs. 789 per mile, and the earthwork on 3 tanks cost from Rs. 5-2 to Rs. 6-1 per thousand cubic feet. In Jhansi⁸ "the rates were ruinous and the work badly done." In Lalitpur,⁹ where the labourers were chiefly employed on tanks hastily planned, and where both the works and the labourers were too numerous for efficient supervision, the cost ran higher than anywhere else: the earthwork cost Rs. 30-8 per thousand cubic feet in one case, Rs. 14 in another, Rs. 13 to Rs. 11½ in others. On the Moradabad-Tigri road¹⁰ (under professional superintendence) the work cost Rs. 15 to Rs. 18 at first per thousand cubic feet; and, as order and system were gradually introduced, it was brought down to Rs. 3½. On the other three¹¹ works carried on by the Public Works Department as special famine relief works the figures are as follows:—

	Cost.	Value.
	Rs.	Rs.
Eastern Ganges Canal - - -	80,311	60,504
Timli Pass - - - - -	91,019	81,361
Kachla Ghat - - - - -	25,631	17,035

A very sensible difference in ratio is thus shown between the wastefulness of famine labour when supervised by Civil and by Engineer officers.

19. *Wages on relief-works.*—The wages on relief-works appear to have followed in most cases the rates recommended by the Government of India, but there were some exceptions. In Bijnor¹² men coolies were cut down to 1 anna in April and 9 pie in June 1859; women to 9 and 6 pie; and men doing women's work, *i.e.*, carrying baskets, were mostly paid as women. Infants and children unable to work received 3 pie after May 1859—the first instance on record of this allowance being made. In Bareilly also,¹³

when the numbers became very large, rates were lowered to 1 anna, 9 pie, and 6 pie for men, women, and children respectively.

20. *Statistics of relief-works.*—The earliest relief-works were open in September 1868 in Jalann, Jhansi, Lalitpur, and Ajmer, and they were all closed in October 1869, except in Ajmer. The district details are shown in a separate table, and the following are the monthly numbers :—

Month.						Number daily employed.	Number of districts in which relief- works were open.
1868.							
September	-	-	-	-	-	3,540	4
October	-	-	-	-	-	5,509	6
November	-	-	-	-	-	17,681	7
December	-	-	-	-	-	23,746	10
1869.							
January	-	-	-	-	-	58,332	16
February	-	-	-	-	-	86,249	18
March	-	-	-	-	-	93,977	19
April	-	-	-	-	-	107,631	18
May	-	-	-	-	-	101,057	16
June	-	-	-	-	-	65,863	16
July	-	-	-	-	-	40,978	14
August	-	-	-	-	-	59,420	14
September	-	-	-	-	-	58,543	14
October	-	-	-	-	-	24,585	10
November	-	-	-	-	-	6,390	1
December	-	-	-	-	-	4,921	1
1870.							
January	-	-	-	-	-	6,555	1
February	-	-	-	-	-	8,798	1
March	-	-	-	-	-	10,228	1
Total	-	-	-	-	-	785,003	
Average of 19 months	-	-	-	-	-	41,737	

RELIEF WORKS.

AVERAGE NUMBER OF LABOURERS EMPLOYED DAILY DURING EACH MONTH OF THE Famine.

AVERAGE NUMBER OF LABOURERS EMPLOYED DAILY DURING YEAR																							
	1868.				1869.												1870.			Average number employed during continuance of the work.	Total cost.	Average number for twelve months.	
	September.	October.	November.	December.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	January.	February.	March.				
Saharanpur	—	—	—	—	2,597	3,874	2,317	—	—	—	—	—	—	—	—	—	—	—	—	—	2,948	23,925	737
Muzaffarnagar	—	—	—	68	294	235	879	271	137	101	99	223	—	—	—	—	—	—	—	—	195	6,583	179
Meerut	—	—	—	—	712	764	537	486	42	42	556	385	498	87	—	—	—	—	—	—	568	6,259	237
Mulana	—	50	251	135	130	605	548	791	637	432	—	—	—	—	—	—	—	—	—	—	393	15,558	426
Agra	—	62	62	65	95	941	1,144	894	723	381	68	—	—	—	—	—	—	—	—	—	443	12,103	369
Etah	—	—	—	63	61	72	65	41	—	—	—	—	—	—	—	—	—	—	—	—	71	1,040	35
Bijnor	—	—	—	1,741	2,464	2,787	18,697	14,059	10,697	3,414	3,337	7,376	6,330	1,483	—	—	—	—	—	—	6,679	130,931	6,122
Moradabad	—	—	—	—	54	473	708	441	443	297	176	2,115	1,182	1,152	—	—	—	—	—	—	637	16,353	493
Bareilly	—	—	—	—	379	379	379	379	225	192	—	5,339	4,801	1,152	151	—	—	—	—	—	1,469	43,231	1,102
Shahjahanpur	—	—	—	—	—	—	—	—	—	—	—	7,000	3,500	332	151	—	—	—	—	—	292	1,132	49
Budann	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	5,200	23,923	867
Terai	—	—	—	—	—	1,140	384	53	—	—	—	—	—	—	—	—	—	—	—	—	527	5,421	132
Fatehpur	—	—	—	—	—	85	1,617	4,506	8,646	1,841	413	275	362	—	—	—	—	—	—	—	2,244	26,241	1,496
Alahabad	—	—	—	540	2,303	2,688	1,992	1,945	3,384	2,173	566	2,082	2,167	630	—	—	—	—	—	—	2,013	35,773	1,342
Hampur	—	—	—	—	70	1,292	3,402	7,039	4,867	3,432	2,868	—	—	—	—	—	—	—	—	—	3,466	102,373	2,888
Banda	—	—	—	—	—	163	1,296	1,296	10,943	6,266	893	434	—	—	—	—	—	—	—	—	3,339	37,290	1,629
Mirzapur	—	—	—	—	2,443	3,097	4,580	4,210	4,117	3,007	129	129	159	—	—	—	—	—	—	—	3,460	110,247	1,730
Jalann	—	—	—	—	312	312	1,053	1,085	766	773	129	129	159	—	—	—	—	—	—	—	491	17,533	573
Jhansi	—	—	—	—	120	181	6,139	7,509	4,352	3,921	2,127	1,476	1,200	413	—	—	—	—	—	—	2,210	71,888	2,568
Lalitpur	—	—	—	—	18,620	20,273	8,176	18,612	12,123	5,295	1,474	3,085	1,020	—	—	—	—	—	—	—	7,954	220,429	8,617
Ajmer Civil Relief Works	—	—	—	—	10,736	17,583	16,002	20,434	21,151	17,054	12,039	12,044	9,110	12,688	4,299	1,325	1,800	2,700	3,678	2,514	4,113	220,429	8,617
Ditto P. W. D. Works	—	—	—	—	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000
Agra Canal	—	—	—	—	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187	7,187
Robikhand Canal	—	—	—	—	521	3,821	3,300	3,300	455	455	455	455	455	455	455	455	455	455	455	455	455	455	455
Meerut Irrigation	—	—	—	—	539	539	539	539	539	539	539	539	539	539	539	539	539	539	539	539	539	539	539
Ramganga Doab Canal	—	—	—	—	6,382	8,332	8,489	6,906	5,522	5,000	6,073	6,435	6,435	6,435	6,435	6,435	6,435	6,435	6,435	6,435	6,435	6,435	6,435
Timdi Pass	—	—	—	—	600	3,591	3,370	3,230	1,437	500	500	—	—	—	—	—	—	—	—	—	1,636	91,019	3,201
Moradabad Tigris	—	—	—	—	—	1,477	1,058	1,992	2,364	444	577	112	—	—	—	—	—	—	—	—	1,130	23,630	659
Kachla Ghat	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	3,540	5,509	17,681	23,746	38,332	96,249	93,977	107,631	101,037	65,863	40,978	59,420	58,545	24,585	6,390	4,921	6,553	8,798	10,028	—	81,938	26,35,564	65,671

Dividing the entire number employed by the whole period of 19 months, the average daily number relieved throughout was 41,937. But for the last five months the works were only open in Ajmir, and during the first two months the numbers were very small. Taking the period during which this form of relief was really active, or the 12 months from November 1868 to October 1869, the average daily number was 65,671. The entire cost of this relief was Rs. 25,55,569,¹ or Rs. 3-3-8 per head per mensem. Of the number employed, 31,338, or nearly half, were employed by the Public Works Department, at an average rate of Rs. 4-1-10 per mensem; and 34,333, or rather more than half, on the district civil works, at an average wage of Rs. 2-7-2 per mensem. This class of labourers, therefore, received very little more than those fed in poor-houses, who cost Rs. 2-4-3 per head per mensem; and although their work was not worth much, it can hardly be supposed that it was not worth a good deal more than the difference between these two figures.

The number relieved nowhere bore a very high proportion to the affected population. The ratio is highest in Ajmir, where, out of a population of 426,000, 18,164, or 4·3 per cent., were employed for 12 months consecutively, and in the worst month 21,154 or 5 per cent. In Lalitpur, with a population of 248,000, 20,273, or 8·2 per cent., were relieved in the worst month, and 8,617, or 3·5, for 12 months continuously.

21. *Other kinds of relief-works.*—These numbers do not show quite all the relief that was given in this way. A few works were started by Local Fund Committees and several by Municipalities, as to which no distinct record exists; but they do not amount to much. The Public Works Department also employed its usual labourers on the ordinary budgeted works of the year, which were not interfered with.

22. (B.) *Gratuitous relief. Change in principle.*—With regard to charitable relief a slightly different position was taken up from that which had been adopted by Government in previous cases. The former principle had been that the relief of the helpless was the duty of the public, and that Government would only assist public charity by contributing a sum equal to the amount of the local subscriptions; but this principle had grown up under conditions which differed from the present. In 1837–38 and in 1860–61 the N. W. P. was the chief sufferer, and the helpless poor were the residents of the province. In 1868–69 Rajputana was the chief sufferer, and this province was inundated with immigrants from that country. It could not reasonably be held that the relief of these immigrants was the special duty of the inhabitants of the North-Western Provinces. Accordingly the formula was altered. It was laid down that charitable relief should be given, as before, by drawing on the liberality of the public, aided by an equivalent from Government; but that the duty of Government did not end with the payment of that equivalent, and that, “if public charity should fail from any cause, the Government must step in to save life.”² It was on this occasion that the famous sentence was issued for the first time, that “every district officer would be held personally responsible that no deaths occurred from starvation which could have been avoided by any exertion or arrangement on his part or that of his subordinates.”

23. *System of poor-houses.*—There is nothing special to notice regarding the system under which the poor-houses were managed, as it seems in all respects to have conformed to the model set in Moradabad in 1861, and the rules laid down by the Government of India in September 1868. It is noticeable that no allusion is to be found in Mr. Henvey's report to any unpopularity of the system or any vehement dislike of the conditions prescribed—residence and cooked food. Indeed, in one district, Hamirpur, it is recorded³ that a considerable number of the recipients of relief in poor-houses were Brahmins.

A very large number also were foreigners, chiefly immigrants from Native States. Thus in December 1868 nearly half the residents⁴ in the Jhansi poor-houses (4,431 out of 9,660) were subjects of Gwalior, Dattia, and Tehri. In May 1869 nearly half the residents in the Lalitpur poor-houses (1,880) were foreigners from the same States.

24. *Statistics of poor-house relief.*—The earliest poor-houses were opened in September 1868 in Jhansi and Lalitpur, and the latest (Bareilly) was closed in December 1869.

¹ These figures differ considerably from those in Mr. Henvey's, page 107, because I have included the numbers employed by the Public Works Department in Ajmir and their cost (the figures of which are contained in Colonel Brooke's report), and have also corrected some minor errors.

² Henvey, p. 5.

³ Henvey, p. 53.

⁴ *Ib.*, p. 70.

Ajmir, however, continued open till March 1870. The district details are given in a separate table, and it is sufficient to notice here the monthly totals.

Months.	Average daily number of inmates.	Number of Districts in which Poor-houses were open.
September 1868 - - -	301	2
October " - - -	412	2
November " - - -	638	4
December " - - -	1,086	4
January 1869 - - -	3,425	8
February " - - -	10,892	15
March " - - -	17,142	16
April " - - -	16,116	17
May " - - -	14,048	17
June " - - -	16,735	16
July " - - -	20,943	17
August " - - -	28,690	20
September " - - -	26,517	21
October " - - -	7,718	11
November " - - -	2,325	6
December " - - -	1,342	2
January 1870 - - -	1,276	1
February " - - -	1,660	1
March " - - -	515	1
Total - - -	172,781	—
Average of 19 months - - -	9,094	—

The total number fed, if distributed equally over the 19 months, give a daily average of 9,094; but if we take the 9 months in which relief was really given to any considerable extent, February to October inclusive, the daily average distributed over those 9 months is 18,675. The total cost of this relief came to Rs. 3,80,757,¹ so that each inmate cost Rs. 2-4-3 per head per mensem. The total number is much smaller than that relieved in 1861, and the cost per head a good deal larger: this is probably due to the higher price of provisions and the disproportionate cost of establishments in some poor-houses, which had very few inmates. Thus in Muzaffarnagar, which had an average number of 41 for 7 months, the cost per head was Rs. 7-2. In Ajmir the number continuously relieved for 9 months is less than 1 per cent.; and in Lalitpur less than 2 per cent. of the population. In no other district does it rise to 1 per cent.

25. *Parda-nashin women, and Travellers.*—As in 1861, parda-nashin women of respectable families were relieved at home without enforcing the condition of residence in a poor-house; this kind of charity was chiefly resorted to in Bijnor and Moradabad. Travellers also were fed whenever they applied for help in their wanderings, and a separate register of them was kept: the districts where they were most numerous were Lalitpur and Muttra.

¹ These figures disagree slightly with those in Mr. Henvey's page 108, in which I have corrected a few minor errors.

Average Number Received Daily During each Month.

M 4

26. *Relief based on personal knowledge.*—In the Native State of Rampur another system of relief was tried. Money was entrusted to the headmen of villages to distribute to those in need; and the result is said to have been successful. But no information was collected as to the amount expended or the number thus relieved.

27. (C.) *Suspension and remission of Revenue.*—At the end of the revenue year 1868–69 about 15 lakhs¹ of rupees were suspended on account of the drought, and of these rather more than 4 lakhs were classed as doubtful. In the orders passed on the Revenue Report, the Government estimated that it would probably be necessary to remit 4 lakhs, or 40,000%. In the end, however, only Rs. 2,20,000 were remitted, and all the rest were collected.² These unexpectedly large collections are attributable to the prosperity which, as far as agriculturists were concerned, followed the good harvest and high prices of the autumn of 1869.

28. (D.) *Takavi advances.*—Takavi advances for seed-grain and bullocks, and for works of permanent utility, such as wells, were given largely; and up to the end of February 1870, when the special sanction was withdrawn, about 10 lakhs of rupees were distributed, chiefly in the districts of Jhansi, Lalitpur, and Bijnor.

29. (E.) *Importation of food.*—Although the principle of non-interference with trade was rigidly laid down and strictly carried out, three cases occurred in which it was considered necessary for Government to step in, as trade appeared to be unable or unwilling to throw in the required supplies of food into certain distressed localities. One instance was the south of Mirzapur, a wild and hilly tract, into which, in January and June 1869,³ food to the value of Rs. 7,500 was despatched by the Collector, and sold and distributed to the labourers in lieu of wages. In this transaction a loss of only Rs. 82 was experienced. The second instance was in Jhansi, where, in July 1869, the stocks had been very short, and the rainy season had made the roads almost impassable. For a short time a panic set in, and “no grain could be bought in the city at any price” till the Commissioner wrote to the Collector of Cawnpore to arrange for the importation of Rs. 10,000 worth of grain. It seems that the knowledge of this order quieted the alarm, and caused the local stores to be brought out; but the actual pecuniary details of the transaction are not reported.⁴ The third, and by far the most important, instance, was that of Ajmir.⁵ The alarm was first given by the Commissioner in September 1868; he got leave to purchase grain to the amount of 1 lakh of rupees, both for distribution as wages and also to ensure the town and troops against a failure of supplies, as it was feared that Native speculation would not suffice to meet the emergency. But his actual purchases were comparatively small, it being found that the local merchants were answering to the stimulus of official encouragement and of high prices, and that all possible means of transport were being utilised. A more serious alarm was felt in September 1869. It was represented that wheat and bajra were then selling at 4 seers per rupee in Ajmir—a sure indication of failing stocks; and that it was necessary to secure a supply for the relief-works and troops, and also for retail sale. It was extremely difficult to obtain carriage, and the petty Chiefs imposed exactions on the transit of grain. Government, therefore, the measure being said to be necessary to save life, reluctantly sanctioned the purchase of 8,000 maunds of grain at Agra, to be escorted by military and police. These transactions were, as usually occurs in such cases, conducted at a considerable loss. Altogether 19,467 maunds (700 tons) of grain were purchased by Government and laid down at Ajmir at a total cost of Rs. 1,13,839. Of this, 12,493 maunds were sold, when pressure was most severe, for Rs. 55,300; 6,416 maunds were issued as food and wages, at an estimated value of Rs. 36,400; 578 maunds were lost by wastage. The total loss on the transaction was Rs. 21,241. The cost of carriage was enormous. One consignment, for which Rs. 15,000 was paid at Allahabad, cost Rs. 11,000 more before it reached Ajmir; on another, the price of which at Agra was Rs. 32,648, the cost of transport to Ajmir was Rs. 14,325. Large quantities of the grain (though carefully examined before despatch) were found to be weevil-eaten on arrival; and all the despatches were found at Ajmir to be short weight, having been extensively plundered on the road. The actual cost to Government in cash, deducting the amount received by sales from the total expended on purchase and carriage, was Rs. 57,820. No figures exist by which the value of the grain distributed as wages or as food can be allotted to the proper heads of relief-works or gratuitous relief.

30. (F.) *Public charity.*—A Central Relief Committee was appointed which sat at Allahabad, and whose functions were to supervise the administration of gratuitous relief,

¹ Henvey, Appendix IX.

⁴ *Ib.*, p. 67.

² *Ib.*, pp. 9, 110.

⁵ *Ib.*, pp. 92–5.

³ *Ib.*, p. 61.

and to collect subscriptions from the public. These contributions amounted to Rs. 67,432, while the officials of the different districts also collected locally subscriptions to the amount of Rs. 1,27,712, making a total of Rs. 1,95,144. To this Government added from the Treasury a sum of Rs. 1,97,416, making altogether a total of Rs. 3,92,560. Out of this, Rs. 5,000 were spent in part-payment of one of the despatches of grain to Ajmir, and the rest covered the expenditure on gratuitous relief.

31. *General Summary.*—The following table sums up, in abstract, the amount of relief afforded to the famine-stricken, its cost, and the way in which that cost was shared between the Government and the charitable public:—

NATURE OF RELIEF.	Duration of Relief.	Average Daily Number relieved.	Cost.	Cost to Government.	Cost borne by Public Charity.
			Rs.	Rs.	Rs.
Relief-works - - -	12 months -	65,671	25,55,569	25,55,569	—
Gratuitous relief - - -	9 months -	18,675	3,87,560	1,97,416	1,90,144
Exportation to Ajmir - - -	- - -	- - -	62,820	57,820	5,000
Remissions of revenue - - -	- - -	- - -	2,20,000	220,000	—
Advances (recoverable) - - -	- - -	- - -	10,16,201	10,16,201	—
Compensation to Railway - - -	- - -	- - -	3,25,000	3,25,000	—
Compensation to contractors of tolls and ferries - - -	- - -	- - -	25,086	25,086	—
Total - - -	- - -	- - -	45,92,236	43,97,092	1,95,144

The total cost of the relief given from all sources amounts to 4 annas or sixpence per head on the affected population. But in the district which suffered most of all, Ajmir, the relief of all kinds given to the famine-stricken amounted to Rs. 11,24,000,¹ or nearly Rs. 3 per head of the population of the district, and almost exactly two years income of the land revenue.

SECTION III.—THE PUNJAB.

[Compiled from Captain Wace's reply to the famine Commission's questions.]

Brief History of the Famine in the Punjab.—In the Punjab the failure of the rain of 1868 extended to the same tract as was visited by drought in 1860, the country between the Sutlej and the Jumna; but Gurgaon and Delhi, which bore the severest brunt in 1860, were now more lightly affected, and the worst part was the Hissar Division (containing the Hissar, Rohtak, and Sirsa Districts) and the Karnal District. The previous season had not been good, but still prices were lower in June 1868 than they had been for some years previous. The rainfall of the year was 25 inches, against an average of 30 for the province, but it was ill-distributed, for between April and October only 16 inches fell, and it ceased almost entirely in August and September. The result was a poor kharif crop everywhere, and a total loss of the crop in the Hissar Division and in Karnal. The Hissar Division was also especially troubled by the influx of starving immigrants from Bikanir. Relief-works were begun in Hissar in October, and the Lieutenant-Governor sanctioned the suspension of the revenue demand wherever Commissioners were satisfied that the realisation of it would cause severe distress.² A Central Relief Committee was also appointed and the contributions of the public invited. The rabi area was necessarily much restricted by the dryness of the soil, and the prospects of this crop also were very gloomy till, in the end of January, heavy rain began to revive it and continued throughout February. Prospects were so much improved by this, that on the 22nd March the Central Committee gave notice that subscriptions were needed no longer. In June

¹ Colonel Brooke, para. 214, has included 5 lakhs spent on Military buildings in Nasirabad, which I have excluded as they can hardly be said to have had any relation to the famine-stricken people.

² The canal irrigation increased thus:—

	1867-68.	1868-9.	1869-70.
West Jumna Canal - - -	331,037	486,878	496,542
Buri Doab Canal - - -	262,455	299,935	233,927

Being an increase on nearly 200,000 acres in 1868-69.

1869 the rains set in favourably, and prices fell everywhere, but this was followed by an almost complete drought through July and August, which caused the gravest anxiety to prevail. In September, however, an abundant downpour saved the withering kharif, and a tolerable crop was reaped. But still the distress in Rajputana and the constant drain of supplies in that direction kept prices at an extremely high level, till the rabi crop of 1870 was ripe. The following table shows the course of prices, as far as they are on record, during each period. The average is struck for the six worst districts in the Delhi and Hissar Divisions:—

Date.	Average Price of Wheat. Seers per Re.					
1st June 1868 -	-	-	-	-	-	23
1st January 1869 -	-	-	-	-	-	10 $\frac{1}{2}$
1st June 1869 -	-	-	-	-	-	13 $\frac{3}{4}$
1st January 1870 -	-	-	-	-	-	8 $\frac{1}{2}$
1st June 1870 -	-	-	-	-	-	13 $\frac{1}{4}$
1st January 1871 -	-	-	-	-	-	17 $\frac{1}{2}$

The highest price recorded was a little less than eight seers in Hissar.

2. *Relief Measures.*—Hardly any detailed record has been preserved of the amount of relief given. The number of persons gratuitously relieved for one day was 6,160,015, or 205,335 for one month, or (if we assume that the period during which relief was mainly given was the same as in the North-Western Provinces), 22,815 persons were fed daily for nine months. This relief cost Rs. 4,25,192, of which Government contributed Rs. 1,69,561, besides giving Rs. 142,300 from the remains of the old Famine Fund, and the balance was raised from private subscriptions. The number employed on minor relief works under civil officers was 2,584,990 for one day, or 86,166 for a month, or (on the same hypothesis as before) 7,180 for 12 months continuously. The cost of these works is not stated. At Amritsar 119,331 persons were employed for one day, or 39,777 daily for one month, at a cost of Rs. 12,819. Wages were 1 $\frac{1}{2}$ annas for adults, 1 anna for children over 10, and $\frac{1}{2}$ anna for those under 10. The system was one of daily wages and no tasks. The average number of cubic feet dug on all relief-works per head daily was 19: at Amritsar it was 10; the number of women and children being very great there, and the earth very hard. One day under constant pressure they did 22 cubic feet.¹ A large number were also employed by the Public Works Department on special or ordinary works; but nothing is on record as to the numbers, or the cost of this form of relief, or the value of their work, or the system on which employment is given.

3. *Remissions of Revenue.*—The remissions of revenue were not very large. The balances due to the famine were about 4 $\frac{1}{2}$ lakhs in 1868-69, and 2 in 1869-70; of these sums, about three lakhs (Rs. 3,11,469) were classed at the time as irrecoverable, and it seems probable that this amount was remitted.² Tacavi advances were largely given for the digging of new wells and tanks, and for the purchase of cattle and seed-grain, amounting in the two years to Rs. 8,31,000.

4. *Loss of Cattle and of Human Lives.*—The loss of cattle was reported to be large, about 88,000, or one-fourth of the cattle of the district having died, it is said in Rohtak, and 300,000 in Hissar and Sirsa. No mention is made in the reports of the time to show what the special famine mortality was considered to be. The mortuary registration gives the following figures:—

						Deaths recorded.	Ratio per Mille.
1867	-	-	-	-	-	312,708	18
1868	-	-	-	-	-	267,785	15
1869	-	-	-	-	-	453,821	26
1870	-	-	-	-	-	418,926	24

which shows an increase of 292,254 deaths in the two famine years over the two preceding. As it appears that only half the true mortality was registered in 1867 and 1868, it may be fairly assumed that the excess mortality of the famine period was not less than 600,000.

SECTION IV.—THE CENTRAL PROVINCES.

[This Section is abstracted from the Replies to the Famine Commission's questions, compiled by Mr. J. G. Nicholls, Assistant Commissioner, under the orders of the Chief Commissioner. That compilation gives a very full account of the season, the condition of different districts, and the reports written from time to time by the Local Officers, but the want, in some districts, of precise statistical information, cannot now be remedied.]

The Famine Tract.—The famine of 1868–69 only touched with severity the outskirts of the Central Provinces, but the drought which caused it, and the high prices which followed in its train, were widely felt. The part most severely affected was the northern part of the Saugor, Damoh and Jubbulpore Districts, joining on to Lalitpur in the North-Western Provinces, and to Rewa in Central India, in which, as has already been seen, the famine was acutely felt. In the southern parts of these districts the crops were poor, and there was considerable distress. In the Nerbudda Valley, the Satpura hills, and in the districts bordering on Berar, prices were high, and there was a large number of immigrants from Rajputana, who helped to drain the local resources, but the population of these parts was able to support the strain without any serious difficulty. In the east, however, where rice is the favourite crop, the drought was more disastrous than in the wheat and millet-growing districts, and in parts of Bhandara, Balaghat, Raipur, and Bilaspur, there was very severe distress, almost amounting to famine.

2. *Brief History of the Famine.*—The character of the rainfall was very similar to what has been described elsewhere. It began lightly in June, and then held off again till the middle of July. During August there was hardly any rain at all, and the kharif was nearly lost, when a heavy fall in September saved a good deal of it. In Raipur and the Eastern Districts (where the downfall had been very heavy in July) there was no September rain at all, and this caused the loss of the rice crop. All over the province the winter rains failed, and there was but little dew, so that the rabi crop was very short, except in the Nerbudda Valley, where the retentive black soil enabled the cultivators to reap an average harvest. The first note of distress came from Damoh, where the Deputy Commissioner reported in July that the labouring classes were without employment, and soon the tide of emigration from the more afflicted Native States began to set in southwards. In September, relief-works were opened in Damoh, and in October in Saugor; in November in Balaghat and Bhandara; in January in Jubbulpore; and in February in Raipur and Bilaspur. Poor-houses also were established soon afterwards. The pressure was lightened for a time in March and April on account of the employment given by the harvest; but in May the numbers began to rise again, and the distress increased till the early kharif grains ripened in September. In October all relief was closed, as the rains of 1869 were abundant, and the crop a good one.

3. *Relief Measures.*—Hardly any details are on record as to the system on which relief measures were carried out. In Jubbulpore, and perhaps in some other places, there was besides the opening of a relief camp or relief house, a daily distribution of raw grain (the quantity is not stated) to all applicants who appeared to be in distress and unable to work, the cost of which was defrayed conjointly by Government and by local

subscriptions. An attempt was made to keep out imposters by employing professional beggars, as well as the servants of the chief contributors, to scrutinise the applicants and reject those not really in want. But these checks were not altogether satisfactory, and the news of this charity attracted great crowds of beggars into the town. There were poor-houses also, or relief-camps, established at all important centres of distress for the sick and infirm; the condition of residence was enforced, and cooked food was given to such as would take it, while others received raw grain,¹ but the quantity given is not stated. It is noticed, however, that no caste objections were made to entering these places, even Brahmin women frequenting them in large numbers in the Jubbulpore District.² The relief-works under Civil Officers in Jubbulpore were of two kinds,—purely local works, such as cleaning out village tanks and wells, and making new roads and railway feeders; the latter were paid for at contract rates, the “Malguzars” or headmen of the villages taking the contract for the work to be done within his own village, and paying for labour by piece-work wages. It is not said what the average wage earned was; but the contract rates were double the ordinary rates, in order to allow for the necessary inefficiency of unskilled famine labour. Feeble labourers were given light tasks and received daily wages. Elsewhere all the workmen seem to have been paid daily wages. The value of the work done varied greatly; in Raipur the cost was from 5 to 11 annas per hundred cubic feet, including establishment, tools, &c.; in Bilaspur 4 to 6½ annas. In Saugor the wages given were 1½ anna to men, 1½ to women, 1½ or 1 anna to children. In Raipur and Bilaspur a man received 1 anna, a woman 9 pie; in Balaghat a man or woman got 2 annas a day. In several Districts the Public Works Department opened special works to provide employment for the famine-stricken; probably these were carried out under the ordinary system pursued by the Department.

4. *Treatment of immigrants.*—In the three northern districts the number of foreign immigrants was very large, both in the relief-works and in the poor-houses; many came also from the British Districts of the Jhansi Division and Bundelkhand, but the people's own account of themselves could not be trusted, as the immigrants from Native States, supposing they would be refused relief otherwise, often asserted that they came from British territory. Out of 1,500 persons relieved daily (on an average) for thirteen months in Saugor, only one-eighth were residents of the district, and of the rest about three-fifths asserted themselves to come from Native States, two-fifths from Lalitpur, Jhansi, &c. In Jubbulpore, in July 1869, half the paupers in the poor-houses were foreigners. They came from Myhere, Rewa, Panna, Nagode, and other States, and were to a great extent induced to crowd into Jubbulpore by the news of the dole of grain given out there. At last, the numbers having increased to an intolerable extent, an effort was made to get rid of them, and some five hundred were sent back to Myhere by train; but as it was doubtful if proper arrangements were made for their support there, this plan was discontinued; they were then sent by train to a place on the Railway where work was offered them, in the Narsinghpur District, but most of them on arriving there refused to work, and dispersed to beg.

5. *Epidemics.*—When the rains set in, an epidemic of cholera broke out, which was especially severe in the Eastern Districts, and in several cases attacked and dispersed the gangs on relief-works. The cattle, too, suffered from murrain, and besides they were so weak from loss of food that they fell down in great numbers and died, unable to drag themselves through the deep mud to and from their pastures. When the rains were over, a great outbreak of fever followed in the autumn of 1869. But all direct famine had ceased by that time.

6. *Mortality.*—Very little is known about the mortality caused by this famine, but it is believed to have been very severe in the northern parts of Jubbulpore³ and Saugor. Mortuary registration was then only just beginning to be worked: the population under registration was about 4½ millions, and in 1868 the death of 77,058, or 16·5 per mille, were recorded. In 1869 the mortality rose to 35·9, and in 1870 it was about 25 per mille. In these two years an excess mortality of 130,000 above that of two such years as 1868 was registered. And as only about half the true number of deaths can have been registered in 1868, and it is probable that the record of 1869 and 1870 was equally defective, it may be reasonably concluded that the real excess mortality of these two years was not less than 250,000.

¹ But in Saugor the inmates received money,—an adult 4 pie, a child from 3 to 1 pie, according to age. Page 21.

² Page 22.

³ A special census was taken in part of the Murwara Tahsil of Jubbulpore after the famine, but its results have been lost.

7. *Cost of the famine to Government.*—The total cost to Government of the relief measures taken during the famine is thus stated :—

	Rs.
Cost of relief-works and poor-houses under Civil Officers	- 3,39,365
Cost of relief-works under Public Works Department	- 4,89,255
Takavi advances for wells, seed-grain, and plough-cattle	- 2,29,716
Remissions of revenue in two districts	- 471
	<hr/> 10,58,817
Deduct charitable contribution	- 61,432
Balance paid by Government	- 9,94,415

The following tables show all that it has been possible to ascertain concerning the number of persons relieved in the poor-houses or on the relief-works in the different districts ; but the necessary statistics have not been reported in a few cases :—

STATEMENT showing DAILY AVERAGES on RELIEF WORKS.

Districts.	1868.			1869.										Total No.	Average Daily No. for 12 months.	Cost.
	October.	November.	December.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.			
Jubbulpore	-	-	-	-	1,018	964	1,423	2,861	5,765	622	-	-	-	12,653	-	Rs. 18,495
Damoh	1,158	1,158	1,158	1,158	1,158	1,158	-	-	-	-	-	-	-	6,948	-	16,540
Saugor	229	118	92	147	254	385	25	106	125	1,055	174	46	18	2,774	-	12,216
Balaghat	-	-	-	-	-	-	424	860	892	-	-	-	-	2,176	-	7,372
Bhandara	-	-	-	-	-	-	147	154	167	-	-	-	-	468	-	1,199
Chanda	484	514	48	366	356	207	363	656	695	83	37	75	-	3,883	-	17,032
Chhindwara	-	-	-	73	138	295	294	207	245	-	-	-	-	1,342	-	3,864
Bilaspur	-	-	35	16	1,433	3,824	2,780	1,200	237	431	283	94	79	10,412	-	19,367
Raipur	-	-	1,520	1,140	2,999	5,394	4,760	2,702	394	853	3,591	3,335	1,825	28,513	-	69,336
	1,871	1,790	3,286	2,900	7,356	12,227	10,216	8,836	8,395	1,988	3,911	3,504	1,904	69,169	5,765	incomplete

These figures are incomplete from want of the Damoh figures, and in Saugor very much was done, as elsewhere, by the P.W.D. Everywhere Municipal and Local Fund Committees were carrying out, as far as they could, petty relief-works. Balaghat Local Fund Committee spent very large sums before April. Seoni was worse off than Chanda.

STATEMENT SHOWING DAILY AVERAGES RELIEVED AT POOR-HOUSES.

Districts.	1868.			1869.												Total No.	Average Daily No. for 12 months.	Cost	Returns incomplete for months after June to November.
	October.	November.	December.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.				
Jubbulpore -	-	-	-	-	2,860	4,194	4,221	4,028	4,596	-	-	-	-	20	-	-	-	-	-
Out poor-houses charitable out-relief	-	-	-	Estimated	-	1,000	1,350	1,100	1,150	1,200	600	200	-	-	-	-	-	-	-
Sudden vagrant and sick camp	-	-	-	Do.	-	-	-	-	-	300	500	400	250	40	-	-	-	-	-
Patan, &c.	-	-	-	Do.	-	-	-	-	-	-	60	150	60	-	-	-	-	-	-
Total for Jubbulpore	-	-	-	-	2,860	5,194	5,271	5,128	5,746	1,500	1,160	750	310	60	-	27,979	-	*25,972	*Cost to end of June.
Damoh -	21	35	36	33	38	41	54	100	356	887	544	1,208	663	120	36	4,172	-	2,949	-
Saugor -	-	-	1,038	331	1,765	1,425	1,695	1,751	1,897	3,207	2,384	2,028	887	27	65	18,400	-	39,165	-
Balaghat -	-	-	-	-	-	5	27	28	29	-	-	-	-	-	-	89	-	256	-
Bhandara -	-	-	-	-	-	-	-	143	336	264	137	-	-	-	-	1,189	-	1,337	-
" Gamindars -	-	-	-	-	-	-	-	-	112	150	47	-	-	-	-	-	-	-	-
Bilaspur -	-	-	-	-	-	104	167	92	240	219	320	493	428	-	-	2,063	-	3,182	-
Raipur -	-	-	-	-	15	51	55	453	447	629	523	775	780	-	-	3,728	-	7,908	-
Probable additions for Damoh and Jubbulpore	-	-	-	-	-	-	-	-	-	6,500	5,500	3,500	1,000	-	-	16,500	-	-	-
	21	35	1,074	364	4,678	6,820	7,269	7,695	9,163	6,856	4,471	3,986	3,405	87	65	74,120	6,177	80,816	-

There was similar relief in Leoni; Returns not available. See my Report, page 45.

SECTION V.--BOMBAY.

[Abstracted from the Administration Reports of the Bombay Presidency for 1868-69 and 1869-70.]

The monsoon of 1868 and its effects.—The irregularity and weakness of the south monsoon of 1868 was felt also in the Bombay Presidency. The whole of the Deccan, and especially the Districts of Poona, Ahmednagar, and Khandesh suffered from drought: in Khandesh only 16 inches of rain fell during the year (the average being 25 inches), and a hot wind blew in the intervals of rain which dried the soil and burnt up the crops. In Ahmedabad, Kaira, and the Panch Mehals, the rains of June and July were slight, but were followed by extraordinary floods in August, which swept away the standing crops and did immense injury to the towns of Ahmedabad and Kaira. The consequence was extreme local distress in those cities, and a widespread but not acute scarcity and dearness of food. To this was added the immigration of the starving people of Marwar, who came in great numbers into Khandesh, Guzerat, and the Tharr and Parkar District of Sindh. The rainy season of 1869-70 was, however, very favourable, the only drawback being a plague of locusts in Guzerat; and all trouble would have been over then except for the immigrants who still had to be provided for till prosperity returned to their own country.

2. *Relief works carried out.*—The notices regarding the relief measures are not as full as could be desired. Special relief works were opened, and the ordinary public works of the year were enlarged to admit of giving more employment to the distressed population. In Ahmednagar three roads were undertaken at a cost of Rs. 43,964,¹ employing 5,100 persons. In Khandesh an important road (from Chalisgaon to Kanhar) was opened, involving an expensive crossing over a range of hills, the estimate for which was about 4½ lacs; on this Rs. 56,114 was expended in 1868-69, and Rs. 3,26,128 in 1869-70, besides Rs. 1,14,017 on other minor relief works.² Rs. 1,12,700 were spent in Ahmedabad and Kaira on the restoration of tanks and wells ruined by the floods. In the Districts of Ahmedabad and Tharr and Parkar the immigrant Marwaris were largely employed on the ordinary current works, and a special piece of road was opened for them, costing Rs. 5,470.³ It has been stated⁴ that in this latter district Rs. 1,14,785 were expended on the relief of the immigrants, but the authority for the figures has not been traced.

Gratuitous relief given.—Besides these relief works, Government gave sundry grants towards gratuitous relief. To the towns people of Ahmedabad and Kaira⁵ Rs. 30,000 were given in 1868-69 to help them to rebuild their houses. In 1869-70 a grant of Rs. 15,000⁶ was made to the Collector of Ahmedabad for the purchase of grain to feed the starving immigrants, and Rs. 3,000 were bestowed on the people of Dhulia in Khandesh. Subscriptions to the amount of Rs. 46,500 were collected⁷ in Bombay and Poona, and sent, with the balance of the Famine Fund of 1864, Rs. 29,300, to the different Collectors for distribution to the sick and infirm sufferers from famine. Most of this money was spent in Ahmedabad.

4. *Cost of the relief measures.*—As far then as these records go, the cost of the scarcity of 1868-70 in the Bombay Presidency may be set down as follows:

	Government.	Public.	Total.
	Rs.	Rs.	Rs.
Relief works - - -	5,44,456	—	5,44,456
Gratuitous relief - - -	48,000	46,500	94,500
Total - - -	5,92,456	46,500	6,38,956

No revenue seems to have been remitted.

¹ Administration Report, 1868-69, p. 197.

² *Ib.*, 1869-70, p. 94. (The figures in pp. 214-15 do not quite agree.)

³ *Ib.*, 1868-69, p. 198-99.

⁴ Report, 1868-69, p. 65.

⁵ Dr. Moore's Reply to Famine Commission.

⁶ *Ib.*, 1869-70, p. 94.

⁷ *Ib.*, 1868-69, p. 65.

FAMINE OF 1873-74.

SECTION I.—BENGAL AND BEHAR.

[**MATERIALS.**—The three official volumes called “Correspondence relating to the Famine in Bengal and Behar, 1873-74, Vols. I. and II.,” and “Special narratives of the drought in Bengal and Behar, with minutes by Sir R. Temple” (Calcutta, 1874), (quoted in the margin as B. B. I., II., or III.) Vol. II. contains Sir. R. Temple’s minute of 31st October 1874, giving a résumé of the events of the famine, which where quoted is referred to specially as “T.” Also Mr. A. P. MacDonnell’s report on “Food-grain supply, and famine relief in Behar and Bengal.”]

PREFACE.

The history of this famine has been written with greater fullness than in any previous case, for two reasons. First, there has been no other famine in which so much pains has been taken to estimate and forecast the degree and the results of the calamity, or so high an ideal held up of the object to be aimed at, or so careful and complete preparations made for achieving that object. Second, the principles adopted by the administrators of relief measures were in many respects different from those which have been worked on before or since; the theory that State relief should not be made too attractive to the recipient, and that tests should be employed to prove the worthiness of the applicant, became gradually more and more discredited, being superseded by the principle that relief should be administered on the basis of the personal acquaintance of the relieving officer with the circumstances of the applicant. It seems, therefore, important that special pains should be taken to trace the progress of the successive steps by which these principles came to be accepted, and the results which their acceptance brought about.

CAUSES OF THE FAMINE.

1. *Season of 1873.*—The crops of the years 1871 and 1872 had been fair average ones, and prices in the early part of 1873 stood at about their ordinary figure. The famine of 1873-74 was due entirely to the failure of the rains of 1873, and chiefly to their deficiency during the three latter rainy months. The season is thus described by Sir R. Temple¹—

“The rain did not begin till late, that is in July, and even then was scanty. It lasted more or less, but never abundantly, till the end of August, when it for the most part ceased prematurely. Enough had, however, fallen to secure a fair yield of the crops that are reaped in August and September. Little or none fell during the months of September and October and November, that is, during the whole autumnal season, when heavy showers are indispensable for insuring the maturity of the rice crop of December (the most important of all the crops), and for sowing the crops which are to be reaped in the following spring. As experience showed that the consequences of drought are sometimes averted by rain even at the last moment, hope was not abandoned till the end of October. Not till then could it be seen whether the apprehension of failure of the crops would be realised or not. By that time, however, it became certain that widespread and heavy loss must occur in the December crop; that the sowing of the spring crop must be short, and that the germinating and growing of what had been sown must be jeopardised. The injury of the December rice harvest was almost irreparable. The injury to the young spring crops might yet be repaired, if rain should fall between the end of December and the beginning of February. Fear was chiefly felt for Behar and for the North part of Bengal, but largely also for all the rest of Bengal, save the eastern part in the basin of the Brahmapootra, and the deltaic region in the south which depends on inundation rather than on rainfall. On the other hand, it had been ascertained that the September rice crop of Bengal and the August maize and coarser grains of Behar had produced an average yield, sufficient to sustain the people till at least the middle of winter.”

2. *Rainfall Statistics.*—The following statement gives the rainfall month by month in each of the districts which suffered from drought. The figures for 1873, as compared with the average, show that the quantity gauged in July was in most cases (except the four North-Eastern Districts), considerably larger than usual, and in August it was quite sufficient; but in September it was only a third of the average, and in October it was entirely wanting, these being the most important months in the year for the great winter rice-crop.

¹ B. B. II., 67, 68 (T.)

RAINFALL of 1873 compared with that of an AVERAGE YEAR.

		June.	July.	August.	September.	October.	November.	Total.	REMARKS.
Shahabad - -	{ 1873 -	1·24	17·29	9·25	2·43	—	—	40·21	The figures for 1873 are taken from Mr. MacDonnell's book, the averages from the Meteorological Report for 1877. It is worthy of remark that the averages in Mr. MacDonnell's book are in every case higher than these. If the facts as to the ordinary amount of rainfall had been as well known then as they are now, the deficiency of September and October would not have been thought so great.
	{ Average -	7·01	12·88	9·63	9·18	2·65	0·18	41·53	
Sarun - -	{ 1873 -	4·11	15·94	9·57	1·12	—	—	30·74	
	{ Average -	6·15	9·49	8·54	6·81	2·65	0·02	33·66	
Darbhanga - -	{ 1873 -	4·36	8·62	7·23	3·87	—	—	24·08	
	{ Average -	6·65	13·66	9·81	10·46	2·71	—	43·29	
Muzaffarpur - -	{ 1873 -	6·16	12·20	9·17	2·52	—	—	30·05	
	{ Average -	6·18	10·57	9·27	8·65	3·45	0·02	38·14	
Champaran - -	{ 1873 -	9·04	11·57	10·32	0·51	—	—	31·44	
	{ Average -	8·30	10·41	10·66	8·04	3·26	—	40·67	
Gya - -	{ 1873 -	1·39	12·74	9·13	2·69	—	0·13	26·08	
	{ Average -	6·22	11·64	9·68	7·21	2·85	—	37·60	
Monghyr - -	{ 1873 -	2·94	16·01	13·83	3·73	—	0·06	36·57	
	{ Average -	6·20	11·33	10·50	7·92	3·60	0·04	39·59	
Bhagalpur - -	{ 1873 -	5·05	9·32	9·62	4·06	0·23	0·06	28·34	
	{ Average -	8·12	11·34	10·66	7·77	4·66	0·03	42·58	
Purnea - -	{ 1873 -	6·97	17·05	9·39	5·14	—	—	38·55	
	{ Average -	10·95	15·31	12·69	11·60	3·51	—	54·06	
Sonthal Pergunnahs -	{ 1873 -	4·05	16·72	9·43	7·17	0·02	0·06	37·45	
	{ Average -	8·53	12·87	12·35	7·11	3·43	0·23	44·52	
Dinajpur - -	{ 1873 -	18·27	8·24	12·62	1·62	—	—	40·75	
	{ Average -	17·92	15·92	12·71	12·86	6·10	0·13	65·64	
Rangpur - -	{ 1873 -	12·91	5·88	13·23	4·90	0·16	—	37·08	
	{ Average -	21·02	17·10	12·70	11·43	5·30	0·24	67·79	
Bogra - -	{ 1873 -	6·74	7·95	12·83	3·29	—	—	30·81	
	{ Average -	15·77	18·25	11·75	13·87	5·11	1·04	65·79	
Rajshahi - -	{ 1873 -	7·34	7·89	12·43	4·60	0·23	0·21	32·70	
	{ Average -	10·60	12·27	11·15	10·92	5·09	0·23	50·26	
Monthly Total - -	{ 1873 -	90·57	167·42	148·05	47·65	0·64	·52	454·85	
	{ Average -	139·62	183·04	152·10	133·83	54·37	2·16	665·12	
Percentage or of excess deficiency of 1873, compared with average -		-35	-8·5	-2·6	-64	-98·8	-76	-31·6	

3. *Effects of the drought.*—This early cessation of the rain was enough to justify the prediction that the winter rice crop must be extremely poor and in some parts would be almost totally lost. It remained to ascertain what the effect of that loss would be. It was here that the great difficulty was met which the Bengal Government had to face, and to conquer as best it could. Never having had a field survey (except in scattered localities) and not being brought into direct communication with the cultivating population by means of periodical settlements, as is the case in the rest of India, their officers had no positive information as to the area generally placed under any particular crop, or the ordinary out-turn of a crop, and could only make estimates more or less hazardous, as to what proportion the winter rice crop bore to the annual agricultural produce and what practical effect on the food of the people would be produced by the loss of a large portion of that crop.

ESTIMATES OF THE AREA OF DISTRESS, THE EXTENT OF THE LOSS OF CROPS,
AND THE NUMBER LIKELY TO NEED RELIEF.

4. *Estimate of October.*—The first estimate of the degree of the loss sustained was made by the Commissioner of Patna, Mr. (now Sir) S. C. Bayley, on October 29th.¹ He reported that the bhadoi or early kharif crop was nowhere first-rate; in some districts it was destroyed by floods; and the winter rice crop would not amount to half an average crop anywhere, while in some parts it would only be an eighth of an average; that unless rain falls in the next 20 days, the rabi crop must be a failure except in Patna;

¹ B. B. I., 14, 15.

that stocks vary everywhere, but that no one considered there was a six months' supply in hand. He estimated the proportion of land under each crop to be as follows:—

TABLE showing the PROPORTION in which the THREE CROPS (BHADOI, KHARIF, and RABI), are generally believed to grow in the several districts of the Division.

District.	Proportion of Land under each Crop, out of 16 Annas of the Lands of the District.			REMARKS.
	Bhadoi.	Kharif.	Rabi.	
1.	2.	3.	4.	
	As.	As.	As.	
Patna - - - -	2	8	6	Bhadoi lands are also grown with rabi after the bhadoi crops are reaped, so that, strictly speaking, the total rabi lands are made up of columns 2 and 4.
Shahabad - - - -	2	6	8	
Gya - - - - -	2	12	2	
Tirhut - - - -	4	10	2	
Saran - - - - -	4	8	4	
Champárna - - - -	6	6(? 8)	2	

5. *Estimate of November.*¹—In the special narrative for the 21st November, the following estimate is given for the crops of the whole year:—

				Or assuming the cultivated area to vary with the population.		
Littoral Districts of Orissa and Bengal, and Sylhet	13 millions	{ Full crop -	average -	208	actual	against 208 average.
Eastern, Central, and Western Bengal and Assam	26½ "	{ A half to three quarters -	-	265	"	" 424 "
Northern Bengal and Behar	26 "	{ A quarter to a third -	-	180	"	" 416 "
Total - - -				603	"	" 1,048 "

Or about three-fifths of an ordinary harvest.

6. *Comparison with 1865.*—On the 25th November, Sir G. Campbell,² drew up a note to compare the drought of 1873 with those of 1865 and 1769. His conclusion was that we know too little about 1769-70 to make a comparison; that the drought of 1865 (Orissa being put aside), though more general, had not been so intense, especially in Behar, as that of 1873; but that 1865 was preceded by a bad year, which was not the case now, so that the two calamities, all things considered, were almost equal. The year 1865, however, had good winter rain and a fair rabi crop; all depended now on what kind of winter rains would fall and what the rabi crop of 1874 would be. On the 5th December,³ the Government of India writing to the Secretary of State accepted this view—

"We incline to the view that the extent and character of the distress in Behar and parts of Bengal will much depend on the winter rains. If they shall be propitious, the spring crops in Behar and Bengal will not be so deficient as we now fear that they may be. There will be good supplies of food obtainable from the North-Western Provinces. If these rains shall fail, then the spring harvest in Behar must be extremely deficient, and the surplus food obtainable from the North-Western Provinces would be much less than what we now hope for."

7. *Estimate of the British Indian Association.*—On the 21st November, the British Indian Association submitted⁴ a most gloomy memorial estimating the outturn of the winter rice crop of all Bengal (Orissa excepted) at only $\frac{2}{3}$ of an average one, and arguing against reliance on the existence of any food-crops in the country. They urged on Government the duty of prohibiting exports of rice, except from Burmah, and of making large importations of food; adding that the "task of feeding sixty millions of people might well appal the stoutest heart." They were asked to explain the grounds on which they took so much worse a view of the loss of the rice crop, and on which they spoke of Government having to feed sixty millions of people, that is the whole population, whereas it was shown⁵ that in the North-Western Provinces famine of 1868-69 the largest number

¹ B. B. III. 9, 10.

² *Id.* I., 55, 59.

³ *Id.* I. 85.

⁴ *Id.* I. 72.

⁵ *Id.* I. 80.

Government ever had to relieve was 13 per cent. of the population for a short time and 3·9 per cent. for a continuance, and that only in one exceptional district.

8. *Revised Estimate of the Association.*—On the 24th December,¹ the Association sent up an elaborate reply to those questions. They asserted that food-stocks were never very large, because it could not pay to keep so perishable a crop as rice in store, and that at most there could not be more than three months grain retained, over and above the usual inter-harvest consumption. Much reliance therefore could not be placed on these. The winter rice crop they estimated as occupying $\frac{1}{16}$ of the cultivated area in Bengal; and this would yield less than half the usual supply. The rabi could not be calculated on as more than half an average crop. They reckoned the stocks of old rice, plus the probable out-turn of the winter rice, at only sufficient to feed the whole population for six months, and taking the ensuing spring and autumn crops as sufficient for two months more, there would be no food for four months in the year. Reduction of consumption would no doubt assist, and if everybody agreed to live on $\frac{2}{3}$ of his usual food, an eight months supply would carry the country over the year; but as a matter of fact such economy is never practised till high prices make it unavoidable. On the whole, they concluded that Government ought to prepare for pouring in grain into the country "sufficient for at any rate a three months' supply." This, as observed by Sir R. Temple (II., 69), implied the importation of 3,750,000 tons of food—an impossible estimate. The Lieutenant-Governor (January 8th) remarked on this² that the Association's estimate agreed fairly with his, that (looking at the three harvests of the year together) only half the average out-turn would be produced. No doubt a half crop would be sufficient to feed the whole province, if they practised economy, and if it could be equally distributed, but it was this very matter of distribution which was the main difficulty to be overcome. On the 6th January the Lieutenant-Governor reported³ that the failure of the rice crop was ascertained to be quite as heavy as had been anticipated; the rabi crop was doing well, but its area was unusually small; and even in ordinary years, he considered (though no statistics on the subject existed) that the best opinion was that the spring crops furnished only a sixth of the food of the people in Bengal, and a third in Behar.

9. *Estimate of the Government of India in March.*—On the 20th March, in a despatch⁴ recapitulating the policy adopted by the Government for the relief of famine, the Viceroy wrote as follows:—

"The absence of any trustworthy statistics as to the area under cultivation in each district and the out-turn of each crop has throughout rendered it a matter of extreme difficulty for us to estimate the extent of the danger with which we have to cope. Even at this late period, although the utmost attention has been given to the subject, our estimates are necessarily somewhat conjectural, but in order to be upon the safe side, we have always accepted the highest estimate which has been made by any responsible authority.

"The tract of country in which distress will be more or less aggravated comprises portions of the Patna, Bhagulpore, and Rajshahy Divisions. The population of the whole of these Divisions amounts to about 25 millions. The rough estimate formed by us last November of the number of persons who, judging from the experience of former times, would be likely to come upon the hands of Government, was about 2½ millions, or 10 per cent of the whole population, for a period of seven months. We are now able to form a more detailed estimate of our wants."

This estimate was that the area of severe distress was confined to a tract of country having a population of 15 millions, and of these Government might have to provide food, at the worst period, for about 18 per cent., or 2,663,000 people; the allotment made was 327,500 tons. In the remaining districts with 10 millions population, no detailed calculations had been framed, but it was expected that few people in comparison would have to be fed; and only 60,000 tons had been allotted for their provision.

10. *Latest Conclusions as to the loss of Crop. Mr. MacDonnell's Estimates.*—It is interesting, after stating these calculations, to compare them with the results arrived at by a careful enquiry specially conducted by Mr. A. P. MacDonnell after the famine was over. These too are only estimates, but they are prepared by a specially competent officer with leisure at his command and every opportunity of obtaining the best information: they are mainly based on actual facts ascertained in small areas: and they are probably the best approximation that can be obtained to the real facts so long as Bengal shall be deprived of the benefits of a cadastral survey. The following table shows his estimates as to the out-turn of average years and of 1873-74 for the

¹B. B. I, 124.

²Ib. I. 138.

³Ib. I. 149.

⁴Ib. I. 315.

three principal crops of the year, and the ordinary amount of food consumed by the people :—

Districts.		Per-centage of cultivated Area under		Out-turn in Tons.					
		Winter Rice.	Other Crops.	Winter Rice.	Bhadoi.	Rabi.	Subsidiary Crop.	Total.	Consumption at 7 maunds per head.
Shahabad	- { Average	54	46	343,000	68,000	207,000	15,000	633,000	422,000
	- { 1873-74	—	—	43,000	17,000	207,000	15,000	282,000	—
Saran	- { Average	28	72	150,000	230,000	156,000	32,000	568,000	504,000
	- { 1873-74	—	—	15,000	153,000	70,000	21,000	259,000	—
Darbhanga	- { Average	57	43	476,000	238,000	168,000	—	882,000	544,000
	- { 1873-74	—	—	77,000	119,000	105,000	—	301,000	—
Muzaffarpur	- { Average	53	47	448,000	162,000	120,000	25,000	755,000	536,000
	- { 1873-74	—	—	112,000	148,000	103,000	25,000	388,000	—
Champáran	- { Average	40	60	247,000	151,000	119,000	—	517,000	352,000
	- { 1873-74	—	—	31,000	94,000	60,000	—	185,000	—
Gya	- { Average	54	46	360,000	85,000	184,000	11,000	640,000	476,000
	- { 1873-74	—	—	180,000	50,000	184,000	11,000	425,000	—
Total	- { Average	47	53	2,024,000	934,000	954,000	83,000	3,995,000	2,834,000
	- { 1873-74	—	—	458,000	581,000	729,000	72,000	1,840,000	—

11. *Criticism of those Estimates.*—With regard to these figures it must be admitted that they seem more likely to err on the side of excess than of deficiency in their estimate of the loss incurred. This is especially so in the case of the bhadoi crop, which depends on the rains of June, July, and August, and which was held to have been largely injured by excessive rainfall in July, although it seems doubtful if in several cases the rain was really excessive. Thus in Champáran the rains were excellent; yet the crop is put at five-eighths; in Darbhanga they were only a little below the average, yet the district is credited with the loss of half its bhadoi crop; in Bhagalpur and Purneah the rainfall indicates only slight irregularity, yet the out-turn is estimated at five-eighths and a half respectively of the average. The winter rice must obviously have suffered severely from the deficiency of the rain in September and October, and yet even here, while some districts received only from $\frac{1}{2}$ to $1\frac{1}{2}$ inches, Darbhanga got 3·8 inches and its loss is estimated at five-sixths of the crop. Bhagalpur got four inches, Purneah five, and are supposed to have lost eleven-twelfths and thirteen-sixteenths respectively; Dinajpur with 1·6 inches saved one-fourth, and Rangpur with five inches saved only a fifth of its crop. Lastly, the rabi, which in all the reports is spoken of as excellent, and in some as unusually good, seems to be valued too low by an estimate which puts its out-turn at three fourths of the average.

12. *Conclusion to be drawn from those Estimates.*—Such criticisms as these, based mainly on the rain registers, would have little weight in other provinces, if opposed to the careful contemporary estimates of men accustomed to deal with Agricultural Statistics and having some definite knowledge of area and outturn: in Bengal, where the requisite knowledge and training are deficient, they may be to some extent worth consideration. Still, if it is assumed that Mr. MacDonnell's are the best approximation to the truth that we are likely to obtain, they indicate a state of considerable prosperity in ordinary years (the out-turn of food being largely in excess of a very full rate of consumption), and they do not indicate that even so extensive a loss of one year's crops (if preceded and followed by good harvests) need necessarily produce severe suffering. According to this estimate, it appears that the great winter rice-crop supplies about half the food produce of the year: that the out-turn of that crop was very little more than a fifth of the average: that the autumn or bhadoi crop was not quite two-thirds of an average: that the rabi was about three-fourths of an average: and that, taken altogether, the food crop of the year, was short by a million tons of the food consumption of an ordinary year. If however the people taking alarm in time should reduce their consumption to the minimum point (say from 7 to $4\frac{1}{2}$ maunds a year or from $1\frac{1}{2}$ to 1 lb. a day) the food crop, even of this year of drought, would be almost sufficient for them, within 100,000 tons, and for that quantity and the seed-grain required for next year reliance might

probably be placed on the reserved stocks of the country which at the lowest estimate must have been equal to more than a two-months' consumption.

13. *Comparison of Estimates with latest Conclusions.*—It is instructive to compare these figures with those of the previous estimates, and to observe how important an influence on the administrative measures was exercised by the statistical ignorance of the people and the officers. Mr. S. C. Bayley estimated that half of Saran and three-fourths of Gya were under winter rice, whereas the true figures were approximately a quarter and a half: consequently the loss of that crop did far less harm than he was bound to anticipate. The Association which represented the landowners of the country was lost in the deepest ignorance; they believed that the spring and autumn crops produced only two months' food for the country, whereas they really produce, on an average, two-thirds of the food, or eight months' consumption. The only correct estimate was that made by Sir G. Campbell, that the spring-crop produced a third of the food supply in Behar; but this aperçu, and the corollary drawn from it that, if the rabi crop should turn out well, the danger of famine would to a great extent pass away, were forgotten or thrust aside in the growing panic and the determination to "avert the calamitous effects of the drought."

BRIEF HISTORY OF THE FAMINE.

14. *Earliest Objective of the Local Government.*—On the 22nd October, the Lieutenant-Governor, Sir G. Campbell, sent his first letter of warning to the Government of India: in Behar and North Bengal the rains, late in coming, had been so heavy as to do great injury to the bhadoi crop, and they had stopped so prematurely that the winter rice was almost all lost, and there was great fear that the ground would be too dry to admit of the rabi being sown. In East and Central Bengal the crops would be poor, but not extremely so: in Orissa alone they were good. He asked that he might receive authority, (1) to commence relief-works at once, (2), to make such importations as are "possible and not likely to be affected by private enterprise," and (3) that exportation of rice from India to foreign countries might be stopped. With regard to the management of relief-works, Sir G. Campbell's² view was that—

"to render effectual aid to the people, it is of all things most necessary that work should be offered in good time, so that the existence of public works may be known to the people at large, and those who stand in need of work may find their way to the work and be suitably provided for, before the greatest stress comes. All experience shows that work is wanted to avert starvation rather than to save people already half-starved and unfit for work, and that it takes time to draw to public works people who are not accustomed to labour for hire. In this view, in case of reasonable apprehension of scarcity, we can hardly begin too soon. * * * There can be no surer test of the state of the country—no barometer, as it were, by which the condition of the people can be better gauged—than the degree to which they seek employment on public works. As such works are found more and more to attract classes usually self-supporting, so we may judge that there is a want in the country; that is, provided that this test is established in sufficient time."

15. *Principles of Relief, prescribed by Supreme Government.*—On the 7th November the Government of India published a resolution³ setting forth the principles on which it was proposed to administer measures of relief to the distressed. The request for the prohibition of exportation was disallowed, but on the other two points the desired authority was given, and certain large works were mentioned—the Soane Canal, the Gandak embankment, and the Northern Bengal State Railway—as suitable works for the employment of famine labour.

Grain was to be purchased only for the food of the labourers engaged on these works; it was not meant to "undertake the general purchase and distribution of grain throughout large tracts of country, or to regulate in any manner the prices of it in the market." The justification of the principle adopted was thus stated:—

Para. 13. "Considerable bodies of men will be congregated on or near the works at a distance from their homes, and often in localities remote from the established markets. It will be necessary, therefore, that sufficient supplies of food be collected for their sustenance. If the accumulation of such supplies be left to the ordinary course of commerce, special pressure will be put on the grain-trade in certain localities at the very time when all its resources are being taxed for the general supply of the province or district. And if the wages were to be paid in case of so large an aggregate of labourers, an extraordinary rise of prices would be created by the action of Government, thereby aggravating the crisis in districts already placed in critical circumstances, and so far counteracting the benefit which the works were intended to secure, namely, the mitigation of the effect of the scarcity.

"Now in regard to these public works carried on under the orders either of the Supreme Government or of the local Government, the State will be in the position of an employer of labour on an unusually large scale, and is justified in doing that which all other employers do, namely, selecting the mode of

¹ B. B. I. 2.

² *Id.* I, 5.

³ *Id.* I, 19.

remunerating its workpeople most acceptable to them and most suitable to the surrounding circumstances. Such mode of remuneration will generally be payment in kind, that is, in food-grain. For this particular purpose, then, sufficient supplies of grain will be purchased and laid in both by the Government of India and by the local Government for the public works under their charge respectively. These supplies will be obtained in such a manner as to interfere as little as possible with the trade in grain and with the supplies of food ordinarily available for consumption in the neighbourhood of the works, or within the area of the distressed districts." * * *

Advances also were to be given to landlords or tenants for public improvements, and at sowing time for seed-grain, and to non-official gentlemen, zemindars, planters, traders, &c., who would undertake the provision and distribution of grain in localities where from the difficulties of transport, the absence of traders or other local circumstances, food cannot during the period of scarcity be obtained by the people. The railways were directed to lower their rate of freight on food grains by half, fixing it at $\frac{1}{8}$ of a pic per maund ($\frac{7}{8}$ of a penny, or a little more than a farthing per ton) per mile, compensation being paid them for the difference. Emigration was to be encouraged to the tea districts of Assam and to British Burmah. Should the distress become severe, a Central Relief Committee would be formed in Calcutta and Local Relief Committees in the districts, to be assisted by Government. The committees should organise a system of relief for those who may be threatened with death or disease for want of food, by the distribution to them of cash, grain, or cooked food, according to circumstances. Information should be published periodically and at short intervals regarding the state and prospects of the crops, the stock of food, the public works in progress, the relief operations, and other circumstances relating to the scarcity.

16. *Earliest instructions as to Relief Measures.*—On the 17th November the Lieutenant-Governor issued a circular¹ of instructions to his officers. He defined the famine tract as consisting of—

- (1.) All seven districts of the Patna Division.
- (2.) All districts of the Bhagalpur Division except the Santhal country.
- (3.) The districts of Dinajpur, Rangpur and Bogra, and part of Rajshahai, Malda and Murshidabad, in the Rajshahai Division.

In this area it was anticipated that the total outturn of food in the year would be only $\frac{2}{3}$ of an average crop, unless copious rain should fall at an early date; in other parts of Central Bengal the outturn was expected to be half the average. He then recapitulated the main heads of relief measures laid down by the Government of India; dividing them into five classes. The first contained the principles about private trade and advances to assist importation. The second was relief-works. Besides the large schemes already mentioned, relief works were to be commenced wherever required, paying the ordinary wages of the country; earthwork on roads was mentioned as the most suitable kind of work. Third, with regard to laying in supplies of grain to pay the labourers with on these works, the rules laid down were—" (1) that Government officers must, as far as possible, operate through the trade; (2) that they must get grain from a distance; (3) that they must only store grain where the local supply cannot be depended on to suffice for the wants of the labourers." But these are to be paid in cash as long as food is cheap: when prices "come to something like famine rates (fall below, say, ten seers per rupee)," then food should be supplied by Government.² Every effort must be strained to get ready store-houses and provide transport for this grain. Fourthly, if events become unfavourable, it may be necessary to distribute charitable relief to the old, to children, to persons in reduced health, and to others who may be unable to do a full day's work. To do this would be the charge of the Relief Committees: Government would give a grant equal to the amount they raised by private subscription "and may when distress goes very far be still more liberal." Fifthly, loans would be given to municipalities and landlords with which to carry on public improvements or works beneficial to villages; and in the case of petty village works which directly improve the water-supply, or are of direct advantage to the general public, Government would pay one-third of the cost. In conclusion, weekly reports were to be submitted by each district and the heads of the reports were prescribed.

17. *The Period of Preparation.*—During the month of December the fears regarding the winter rice crop in Bengal and Behar were realised. The rabi crops however sprang

¹ B. B. I., 48.

² This was afterwards relaxed to some extent at the instance of the Government of India, especially as regards Burmah "cargo" rice, which was found to contain much husk and was allowed to be sold cheaper than Bengal rice (December 22nd, p. 104).

up much better than had been expected, and in the end of January and beginning of February the long-wished-for rain fell in such abundance as to secure a good harvest, and considerably to contract the area and the degree of extreme distress. Enquiry was pushed on regarding the deficiency of supplies and the anticipations of famine; information was collected as to the extent and population of the parts where it would be intense; and estimates were framed of the number of people likely to need relief and of the food-grain which would have to be placed in the country in order to provide relief.

The great anxiety of the Government now was to throw as much grain and as early as possible into the famine tract, so as to be beforehand with the distress when it should break out, to take advantage of the favourable weather before fodder and water became scarce; and to be free to act with vigour in case the rabi crops should fail and the prospects of famine become more grievous. The slowness of the progress made in transporting the grain caused considerable anxiety. Out of 18½ lakhs of maunds (or about 70,000 tons) which it was proposed to place in the distressed tracts by the end of January, on the 3rd January only about 6 had been despatched by railway from Calcutta and the North-Western Provinces, and only 3 or 4 lakhs had started from the railway stations for the interior, very little of which had arrived.

At last in the end of January, the time having come when it was expected that distress would be actively and keenly felt, Sir R. Temple was sent to Behar (he being then designated as successor in the Lieutenant-Governorship to Sir G. Campbell, whose health was so seriously affected that he was compelled to retire) to take charge of all relief organisations; his principal duty being to frame in communication with the local officers careful estimates of the number of persons in each district likely to come on relief, of the quantity of grain required for their food, and of the best means of providing transport for it into the interior of the district. About the same time a Central Relief Committee was appointed and a public meeting held (4th February); instructions were issued for the guidance of the local Relief Committees, and gratuitous relief was started all over the Famine Tract. By this time the numbers on relief-works had risen to 113,000; but hardly any gratuitous relief was given before February.

18. *Import and Transport Operations.*—The early part of this middle period witnessed an immense increase of activity in the importation and transport of food. During the whole of February Sir R. Temple was on tour in the famine tract, and after visiting each district, he framed estimates, in communication with the local officers (though not always in agreement with them, for his estimates generally exceeded theirs) of the numbers likely to require relief in any form, whether in payment of wages, in gratuitously given food, in the shape of advances of grain to be repaid afterwards, or the sale of grain where it was otherwise unobtainable, and of the provision of grain necessary. From Sir G. Campbell's first tentative estimate of 70,000 tons, subsequently raised to 150,000, the amount required now mounted up to 404,000 tons, or including reserves 480,000 tons.¹ To carry this quantity from up-country and from Calcutta to the railway stations of Behar and Bengal taxed severely, but did not surpass, the resources of the Railway Company, but to transport it from the railway stations to the interior of the country, and especially to the north of the Behar and Bhagalpur Divisions, before the rains should set in in June and make the roads impassable, was a Herculean task, which nothing but immense energy and gigantic preparations could have surmounted. Water routes were used wherever it was possible, but the dryness of the season impeded navigation. Steam ferries were established to cross the grain over to the north of the Ganges, and steamers were bought or built in the country, and ordered from England; altogether 41 steamers and about 7,000 country boats and canoes were employed on the ferries and the water routes. A temporary railway which was constructed to Darbhanga, at the rate of one mile a day, and at a cost of 330,000*l.* (of which 145,000*l.* was ultimately charged as the excess cost due to hurried execution on account of the famine), was opened on April 17th, and it alone carried 31,213 tons of grain, and 8,031 of fodder, before it had to be taken up in consequence of the floods in the second week of June. But the chief reliance had to be placed on country carts, and it was found necessary to abandon the system of hiring these direct from the cart owners, and to give contracts, at enormously enhanced rates,² for the conveyance of large quantities. These contracts were mostly

¹ B. B. II, 86. (T.)

² The exact figures are nowhere stated in the official correspondence and minutes. Sir R. Temple, in his closing Report, says (II, 76)—“The contracts involved a rate of hire just double that of ordinary times.” The Author of the Black Pamphlet states that the usual rate for a two-bullock cart before the famine was about eight annas for a day's journey of 12 to 15 miles, carrying a load of ten maunds, and that under the contracts given in Behar, each cart was paid 2 rupees a day on an average, while for two districts contracts were given at the rate of six pies per maund per mile, or 4 rupees a day for a journey of 13 miles (pp. 73-1).

taken by companies of Indigo-planters. For fear of these arrangements breaking down, a reserve transport train was organised at Allahabad and sent down under the command of military officers, and in case an epidemic should break out among the cattle, a quantity of camels, mules and ponies were purchased from all parts of Northern India. About 100,000 carts and 230,000 draught or pack animals were at work in March. Altogether the casualties of the season amounted to 14,000 carts and 28,000 bullocks;¹ a loss which might have seriously crippled the operations, had it not been for the Reserve Train, the whole of which was in effect brought into action as soon as it was got together and arrived on the scene. Altogether 340,000 tons were carried from the north bank of the Ganges to the interior, by the middle of June.

19. *Increase of numbers in March.*—Early in March there was a sudden rush of vast numbers on to the relief-works in the Darbhanga and Madhobani sub-divisions. “About 400,000 persons came trooping in from the villages around and settled down on certain lines of relief roads. Almost all were in destitution, most were in very poor strength and condition, many were emaciated, and some were near starvation.”² The rush was so sudden that the local officers were taken by surprise and for a time the crowds defied all discipline and management. Sir G. Campbell recorded in his minute of March 28th³ that up to that time there had been no such lack of food as had been dreaded. Active private import was going on, and food, though dear had not reached extreme famine prices. The bazaars were well supplied with grain, principally pulses, rice being scarce and dear. The time had not come for sales to the public, but he directed⁴ that the stores should be opened for the relief labourers, and rice sold them at 10 seers per rupee: it could not be sold cheaper (at 12 seers, as had been proposed) without deranging a still active private trade.

20. *Close of Sir G. Campbell's tenure of Office.*—On the 8th April,⁵ Sir G. Campbell made over the office of Lieutenant Governor to Sir R. Temple. In the last letter written during his tenure of that post, dated April 6th,⁶ the following description of the prospects of the season is given. The present season so far promises very well. There had been a beneficial fall of rain in Northern Bengal, and if the ensuing months are showery—

Para. 7. “The Lieutenant-Governor would hope that, after the provision which has been made for supplying the distressed districts and maintaining a reserve, the condition of the people in the greater part of Bengal Proper may not be greatly changed for the worse.

“In the parts of Behar where the rabi harvest has for some weeks given employment to the people, we must expect a large accession to the numbers for whom employment and relief provision must be made between the end of the rabi harvest and the rains. But if the unusual drought is followed by early rains, as is frequently the case, that period will not be very long; and when good rains commence, we may expect that, in all districts not reduced in an extreme degree, the people will of their own accord betake themselves to agricultural pursuits.”

21. *April estimate of the requirements of Relief.*—In April, sufficient knowledge having been gained regarding the state of the country, Sir R. Temple framed⁷ the following estimate of the area of suffering, and the amount of relief required:—

—	Area in square miles.	Population.	Number expected to require relief at the worst season.	Per-cent.	Quantity (in tons) of grain allotted.
Very distressed tract -	20,950	10,700,000	2,805,080	26·2	330,000
Partly distressed tract -	19,159	7,064,650	918,484	11·5	74,000
TOTAL - -	40,109	17,764,650	3,723,564	20·9	404,000

The very distressed tract contained a large portion of the Districts of Saran, Champaran, Tirhut, Bhagalpur, Purneah, Dinajpur, Rangpur and Bogra: the partly distressed tract contained portions of Shahabad, Gya, Monghyr, Santhalia, Malda, Rajshabai, Pabna, Murshidabad, Jalpaiguri, Bardwan, Birbhum, Bankura and Manbhum.

22. *Condition of the country in April.*—The following passage⁸ shows Sir R. Temple's view of the condition and prospects of the country in the middle of April, shortly after he assumed the reins of government:—

“There was, on the whole, every reason to fear that the larger portion of the people in the worst tracts would be forced to look to the State for assistance, more or less until August. The official

¹ B. B. II, 98. (T.)

⁶ I, 349.

² B. B. II, 83. (T.)

⁷ B. B. II, 87-8. (T.)

³ I, 326.

⁴ I, 341.

⁵ II, 91. (T.)

⁸ B. B. II, 91-2. (T.)

investigation had penetrated to every village. It was proved that the class of destitute poor and beggars, ordinarily supported by private charity, could no longer be sustained by these means, the donors of such alms being themselves in straits. It was found that the non-agricultural classes— weavers, workers in metal of all kinds, carpenters, artisans of all sorts, fishermen, menials and others— had nothing to eat, and where wholly out of work; that the extensive class next above these, namely, the field labourers, and the small cultivators who occupy some land and eke out their livelihood by working on the land of others, had eaten up their little stores and were bereft of employment. It was further apparent that destitution was gradually creeping over other classes, such as the cultivators generally (with the exception only of the occupancy tenure-holders) and such as the Brahmans, whose habits and notions unfitted them for active work. Although the distress had been successfully checked in most places, the cases of starvation being very rare, yet in some places distress was discovered to have reached a critically dangerous degree, relief arriving only just in time to restore the emaciated, to resuscitate the fainting, and to avert considerable mortality."

It was then decided that all gratuitous relief should be given, and all relief wages paid, in grain, and that sales to the public might be much more generally authorised.

23. *Close of famine.*—In Behar the rains began early in June¹ and fell in a very favourable manner, and the numbers on relief-works which had reached their climax in the first half of June, fell rapidly in June and July as the people dispersed to agriculture. An unusually large area was sown with the early crops, millets, &c., which ripen in August and yield the speediest return. The number on charitable relief, however, went on increasing,² "because distress is extending over those of the lowest classes who " cannot work, and upwards among those ordinarily above work, and because the whole " class of professional beggars is thrown on the hands of Government." The men labouring on relief-works had also supported infirm dependants with their surplus wages, and when they dispersed to agriculture, they left these people to be supported by Government. In August the numbers of these classes also began to diminish, and in September relief was almost at an end. In Lower Bengal, however, the case was slightly different, for there a second failure of rain was threatened, none having fallen in August. But the destruction of the winter rice was averted by a timely downpour after the first week of September. During this time of suspense the numbers on relief mounted up rapidly, but they declined again when the rain fell and relief was administered with somewhat greater stringency. By the end of October, the special establishments and the large organisation collected together for the relief measures, were broken up; all but the accountants and auditors who were still busy in settling and posting the accounts.

24. *Calculations as to numbers relieved at different times.*—The number of persons who were receiving assistance from Government on the 15th June were thus calculated³:—

"In order to make the estimate * * * * we have the following data to form a basis :—

Total number of relief labourers	-	-	-	-	1,770,732
Total number of persons on charitable relief	-	-	-	-	401,959
Total grain expenditure, in maunds, of first half of June	-	-	-	-	843,000

Thus we have 2,172,691 persons receiving relief, quite irrespective of those who are living on advances or purchases of Government grain. The amount of Government grain disposed of during the fortnight would give three-fourths of a seer a day to 3,401,900 persons for a fortnight. But among the people who consumed Government grain were all the persons on charitable relief, and a large portion of the labourers. The district narratives show that by the end of the first fortnight of June, the practice of paying all labourers in grain, though largely introduced, had not been fully carried out. The Bhagalpur return is the one which best distinguishes between sales to the public and those to labourers; and that shows 98,228 maunds sold to the public, as against 25,628 maunds sold to the labourers. All the district narratives show that the non-labouring public are the chief customers at our granaries.

"It would therefore be probably within the truth to take one-half of the persons supported by Government grain as being outside the relief labour and charitable relief lists. By this reckoning, the total numbers receiving assistance in one shape or other would be—

Labourers and paupers as above	-	-	-	-	2,172,691
One-half the consumers of Government grain	-	-	-	-	1,700,950
Total	-	-	-	-	3,873,641

"The best estimate that we can now frame shows that the numbers at the worst period was 3,900,000 persons receiving assistance of some sort.

"As stated at the time, this statement, though very large, may have been slightly under the truth, certainly not above it. It apparently agrees, as nearly as could be expected, with the estimated numbers given at the beginning of April, as shown in Chapter III" (see paragraph 21 above). "The general per-centage of this number on the population affected was seen in that chapter to be 26 per cent. in the most distressed districts and 11½ in those less distressed. The ratio of course varied considerably, being in many places less than that above stated, but in the worst tracts of North Behar it stood as high as from 50 to 70 per cent."

¹ B. B. II, 102. (T.)

² II, 38, 14th July.

³ B. II, 101-2. (T.)

"But there was a further mode whereby assistance was rendered by Government which could hardly be included in any particular statement presented at that time, namely, the cash advances made by Government to individuals, European planters, native traders, and others for the importation of grain; and to landholders and zemindars for agricultural improvement. These advances of cash went on month by month, till they reached the sum of 46 lakhs of rupees, or close upon half a million pounds sterling. How many persons virtually derived their subsistence from this source it is impossible to say. But the sum was enough for feeding 500,000 persons for seven months, and that number ought at least to be added to the 3,900,000 given in the above statement. On the whole, then, nearly four and a half millions of souls must have been receiving assistance directly or indirectly from the State at the worst period. Under this view of the case, it must be admitted that the actual distress did exceed the estimate. But in reference to the uncertainties of the case, the difference between the estimate and the probable actual is not great."

A similar estimate was made¹ for the numbers on relief on the 15th August—

Labourers on relief-works	-	-	-	426,738
Persons on receipt of charitable relief	-	-	-	647,550
Persons living on purchases of Government grain, being the number of people that would be supported for one month by the grain sold between the 15th July and 15th August, at the rate of $\frac{2}{3}$ ths of a seer per day per head	-	-	-	1,282,464
Persons living on advances of Government grain, being the number of people that would be supported for one month by the grain advanced between the 15th July and 15th August	-	-	-	1,692,936
Add for persons still deriving support from advances of money made to zemindars and other residents	-	-	-	200,000
Total	-	-	-	4,249,688

At the end of October² about 150,000 were in receipt of Government assistance, and these were principally in the Bardwen Division.

"The only district north of the Ganges which shows any appreciable number of such persons is Saran. This most fortunate decline has occurred from the middle of September onwards at a quicker rate than was anticipated when the estimates of distress were first formed. Those estimates provided for 520,000 persons needing assistance during October, and 316,000 in November. Experience on former occasions showed that considerable distress occurred in the autumn. It seemed proper to assume that the same thing would happen on this occasion. In many of the worst districts the autumn crops were known to be small in ordinary years. It was therefore feared that such tracts would not receive a new supply in sufficient quantity till December. As it has happened, however, the distress at this season has proved very slight in most districts, and has so far most agreeably disappointed expectation. The cause is to be found partly in the administration of relief which had been going on during the previous months, which maintained the people in fair condition during the crisis, and so facilitated their discharge towards the end, but chiefly in the abundant produce of the early autumn crops, which, as already described, had been sown over so much larger an area than in ordinary years."

SPECIAL ESTABLISHMENTS AND ORGANISATION FOR RELIEF.

25. *First step to organisation.*—In December³ the first steps were taken to strengthen the ordinary establishments. The appointments then considered necessary were a Special Relief Commissioner for the Rajshahye Division, an Extra Secretary to Government, two officers to superintend the import and transport of grain from Calcutta, about 34 superior officers to be employed under Commissioners and District officers in general relief-work, and some 700 extra clerks, store-keepers, transport agents, pcons and store-house guards, &c., in the lower grades. A special office was created to keep and audit the famine accounts. The total charge was to be Rs. 38,000 a month, or three lakhs of rupees to the end of September.

26. *Second step.*—In February⁴ this estimate was raised by the addition of a Relief Commissioner for Northern Behar, an inspector of transport arrangements at Patna, 25 military officers for transport duty, a medical staff consisting of 2 surgeons, 8 apothecaries and 60 native doctors, 24 superior and 24 inferior native revenue officials, 600 guards and 20 clerks: the additional cost was to be Rs. 32,000 a month. The total cost for six months was estimated at five lakhs of Rupees.

27. *Completion of the scheme of organisation.*—In the minute⁵ written on the 28th. March, after Sir G. Campbell's visit to Darbhanga, he dwelt as the first and most important point of all, on what had been done and what remained to do to secure a completely efficient system of relief administration. Circles and sub-circles had been formed under European and Native officers. What was most wanting was "inferior" machinery reaching down to each village." This must be obtained as far as possible by

¹ B. B. II, 107. (T.)

² *Id.* II, 108. (T.)

³ *Id.* I, 66.

⁴ I, 233.

⁵ I, 324.

utilising the zemindars, headmen and village accountants. They must "keep a nominal roll of all persons in the village receiving relief either on works or gratuitously. Through them the village management may be conducted, and they will be responsible to check abuses." He held that more reliance might safely be placed on native superintendence. There was an unreasoning prejudice in favour of European agency: but it was impossible to procure a thoroughly competent and trustworthy European for every circle and every work. Altogether 260 European officers of superior rank had been sent, and besides them a large number of native officials from other parts of Bengal and from the North-western Provinces, and several native officers of the Army. In this way he aimed¹ at getting for each circle (1) a competent officer in charge, whether European or Native, (2) a capable assistant generally a native, (3) an officer specially to supervise the relief works, and see that the labourers work well and are paid properly, and (4) an inferior native assistant. Under the circle officer come the superintendents of village groups, that is to say, "over each group of villages, there will be some one in charge to look after the relief operations generally in the villages, to manage the grain stores, and inform the circle officer of what is going on." But beneath all this, he dwelt very strongly on the necessity of extending the system down to the village itself, and of "not acting as if they were in a strange or hostile country, but utilising those whose duty it is to assist the people, and finally through them, or in the last resource without them, to get at the headmen and representatives of the people themselves."

"The moment we go beyond the stage of great public works, it is totally impossible to deal with the people in detail, unless we have them localised and individualised, village by village, and name by name. We cannot send them away from the roads till the village machinery is ready to receive them; we cannot distinguish people receiving relief by labour, charitable relief, and relief by advances, or prevent the same persons from receiving relief in different shapes, till we have all those receiving relief registered, name by name, according to their villages, by some person who knows them, and who can be made responsible for their coming and going. Above all, it will be totally impossible to deal with the people on our hands, and wean them eventually from dependence on Government, unless we have an individual knowledge of them in their villages."

28. *Object of the organisation.*—The main object of all this organisation was to substitute direct personal knowledge for self-acting tests—

"When the arrangements we are now making in the most distressed districts are complete, I trust that we shall be able to lay our hands on each person requiring relief according to his residence and circumstances. We shall be able to say in each village—here are so many persons found to be fit objects for relief; so many are doing work of some sort; so many are receiving a charitable allowance of food; so many have received or will receive advances to enable them to continue their cultivation; so many residents of this village are absent working on such a public work. On the public works, again, I hope we shall be able to say—here is a gang from such a pergunnah and a gang from such another pergunnah; so many (name by name) from such a village, and so many from such another. It is only when things are so arranged that we shall be able to deal with the needs of the people in detail, and to supply their wants without the great abuses which must attend indiscriminate liberality to great multitudes whom we cannot distinguish."

"Employment on works I have already dealt with."

"Employment in the way of spinning, weaving, &c., is, as before arranged, to be given as much as possible to those who cannot go on the roads. If we have sufficient information and sufficient machinery, charitable relief is only a question of discretion and honesty. Cooked food being reserved for special cases, it remains to give a fair allowance of food gratuitously, or at a reduced price, and so much money as may be necessary to supplement it, to those really in need of such assistance."

On the 30th April² the Government of Bengal reported the arrangements made up to date for the supervision of relief measures. There were 18 sub-divisions, officered by covenanted civilians; 91 circles, each under a superior official, European or Native; 190 circle assistants under those 91 circle officers; and 450 group or sub-circle officers, who were generally subordinate revenue officials or non-commissioned officers of the Native Army. All these posts had been filled, but to provide for the vacancies that must occur from sickness and unavoidable causes, a reserve of from 10 to 20 per cent. of these numbers had to be arranged for, and 120 officers of these different grades were either appointed in Bengal, or transferred from other Provinces, or warned to hold themselves in readiness to start as soon as they might be ordered.

29. *Fuller accounts of the special organisation.*—In his final report, Sir R. Temple gives an interesting account of this remarkable and elaborate organisation. The country³ was divided into circles, of from 50 to 100 villages; each circle to be the unit of relief administration, supervised by a European or Native officer with a staff of subordinates, and with at least one grain depôt from which the smaller granaries in the circle should be supplied; the object being that all relief operations should be inspected at least once a week, and supplies distributed in every severely distressed village. It was expected

¹ B. B. para. 30.

² *Ib.* para. 7.

³ *Ib.* para. 34.

⁴ *Ib.* 370.

⁵ *Ib.* II, 78-79. (T.)

that there would be 150 such circles, and each circle would need at least 10 inspectors of villages, each with a granary; every granary would need a store-keeper, and the circle officer would need several for his central depôt, besides native clerks: thus altogether about 25 subordinates would be needed in each circle. In the less distressed parts the circles might be less elaborately equipped. The actual details of the organisation as finally settled were shown as follows¹:—

District and Sub-Divisional Relief Committees	-	-	90
Organised circles under Government officers	-	-	158
Sub-circles or groups	-	-	1,141
Circles under private persons, European or Native	-	-	242
Sub-Committees	-	-	650

The equipment of these was :

European superior officers	-	-	-	102
Circle officers	-	-	-	158
Native officers	-	-	-	1,279
Grain keepers and other subordinates	-	-	-	3,395
Private persons, European or Native, employed on relief	-	-	-	2,026
European Surgeons	-	-	-	5
Native Assistant Surgeons and Doctors	-	-	-	136
Special Chief Engineer	-	-	-	1
Superintending Engineers	-	-	-	4
Executive and Assistant Engineers	-	-	-	56
Overseers and subordinates	-	-	-	113
Grand Total	-	-	-	7,275

The actual cost of this establishment is shown in the final accounts to have been Rs. 25,00,000.

30. *Results achieved by the special establishment.*—The history of famines can show no parallel to the elaborate organisation summed up in these figures, carried out as it was with all India to draw upon for men, with no restriction as to money, and on the system laid down by the greatest Administrator of the time. That this relief establishment was admirably efficient in paying wages, in advancing loans, in distributing and selling grain, in saving life, and preventing hunger, is abundantly proved by the results. Whether it was as discriminating as it was efficient, the official reports are altogether silent. Evidences are not wanting, as will be related further on, that in some cases the demands made, even on this great establishment, were heavier than they could meet: but on the whole there is little to show to what extent, or whether to any extent at all, it realised the magnificent ideal of Sir G. Campbell, that it should be able to learn everything about everybody, and that relief should be given to each applicant on the personal knowledge which the relieving officer possesses of his wants. Considering, however the difficulty of achieving any such result under the most favourable opportunities, the little leisure which any of these officers had to become acquainted with the hidden resources of the people, the little experience of Administration or knowledge of the language possessed by most of them, the enormous number which they had to deal with, and the pressure that was imposed on them to be liberal rather than economical with the resources of Government, it seems highly improbable, in default of the most positive evidence, that such an aim can have been to any great extent attained. And on the whole it cannot be said that the experience of this famine proves that it is possible for an establishment, however numerous and able, to administer relief to a great body of people without the application of self-acting tests, or in pure reliance on their personal knowledge of the circumstances of the applicants.

PROHIBITION OF EXPORTATION.

31. *First suggestion of prohibition.*—The arguments used for and against this important step deserve to be summarised with some degree of fullness. In his first letter (October 22nd) reporting the probable advent of a scarcity, Sir G. Campbell² begged "to suggest" "that the export of rice to foreign countries from Indian dominions might be stopped." If there was a general failure in Bengal, all that India and Burma could supply would go but a little way to fill up the vacuum. On this the Government of India wrote—

"We have not thought it desirable to issue this order; and it appears to us to be probable that the wiser course will be obtain any supplies of rice which may be necessary by purchase, directly or indirectly, rather than to take a step which must necessarily derange trade, give occasion to claims to

¹ B. B. II, 89-90. (T.)

² *Id.* I, p. 3.

compensation which it would be difficult to adjust and which might not add materially to the stock of rice available to meet the apprehended scarcity."

On the 1st December¹ the Secretary of State approved the Viceroy's decision in the matter.

On the 7th of November² the Viceroy wrote to the Secretary of State that he believed the deficiency in Bengal and Behar could be met without importation from abroad or from Burma, that the rise in prices which has occurred and must increase would of itself attract rice from Burma to Calcutta, and that to prohibit exports would have the effect of artificially reducing prices at the beginning of a season of scarcity, and would shake the confidence of the mercantile classes.

32. *Further arguments for prohibition.*—On the same date,³ the Lieutenant-Governor wrote that he accepted the decision of the Viceroy not to prohibit export from Burma.

"* * * But he desires to submit that even if it be decided not to interfere with the great export of 700,000 tons of rice which goes yearly from British Burma, still the Government of India might very reasonably and fairly consider the expediency of interposing (by legislation, if necessary) to prevent exportation of food from Bengal.

"The port of Calcutta has in ordinary years sent away about 350,000 to 400,000 tons of food-grains per annum; in the current year it may be expected that eventually common rice in Calcutta will be too dear for export, though at this moment export is going on, as much as 94,000 maunds having been exported since the first of the present month. But from the ports of Chittagong and Morellgunge, whence were exported from 50,000 to 70,000 tons of rice during the last year, and from whence common rice only is exported, large consignments of rice will continue to be exported to the Mauritius, Galle and other rice-consuming British, French and Dutch colonies. The rise of a rupee or so per maund in price will not prevent these colonies from getting their supplies of Bengal rice just as heretofore, and the rice exported from Chittagong comes into the market far earlier than Burma rice; in fact, new rice is already coming into Chittagong. The East Bengal rice, moreover, being 'ballam' rice is of a kind which is much more acceptable to the people of the distressed districts than Burma rice can be. If this rice cannot be exported, it will find its way to the distressed districts. The West India and other colonies will still have many sources to indent upon; and so their populations (Indian and others) cannot suffer so long, at any rate, as Burma export continues."

To this the Viceroy still replied⁴ in the negative. "The natural effect of a rise in price must be to check, and ultimately to stop, export altogether," and in fact the amount exported in October was not half the exports of the corresponding months of last year.

33. *Sir G. Campbell's view of the effects of non-prohibition.*—On the 23rd December⁵ the Lieutenant-Governor wrote again to explain the condition of trade which was then going on. The Government of India had taken exception to the remark that "the Commissioner of Bhagalpur was told that if exportation was going on in his Division, he might fairly purchase in the local markets so much as would practically put a stop to the export of grain." Sir G. Campbell explained that as the Commissioner had to lay in a stock of food for his relief-works, and there was a considerable export of grain going on, it seemed "unnatural that while private traders were exporting grain, we should be importing it to the same localities." And he quoted a story told by the Magistrate of Bhagalpur that cartmen were especially willing to carry Government grain to the north of the district, because they expected to get return loads of grain to bring back from thence. It seemed obviously better therefore that the Commissioner should buy his grain locally, till prices should rise so as to make it unprofitable export. But this was what was going on over all India. The very ships that brought Burma rice to Calcutta, brought it the more readily because they were sure of getting freights of Bengal rice to carry away. "To follow the law of free trade and supply has considerable advantages; to interfere with free trade by stopping export, securing the maximum supply which the country affords, and then importing as much more as is required, has also advantages, more considerable than the former course: but to follow a middle course, neither trusting to the law of supply and demand nor stopping the export of food, may lead to this, that one set of forces militate against and neutralise the other, and we gain nothing whatever, but rather may lose on the whole." He then refers to the lowness of prices and says—

"The apprehension which has lately been growing in Sir George Campbell's mind is that in truth the imports and arrangements to import on the part of Government may by keeping down prices have been a main cause of the export. He has begun to fear that it may be possible that Government imports without the prohibition of exports may do more harm than good. The imports facilitate and increase exportation by cheapening rice in the Bengal markets."

Government might no doubt raise prices at once by going into the market and buying grain; but this would cause violent perturbation and distress to the people by raising prices in a degree altogether disproportioned to the extent of the purchases, while

¹ B. B. I., p. 121.

² *Id.* I., p. 9.

⁵ *Id.* I., 111.

³ *Id.* I., 28-29.

⁶ *Id.* I., 113.

⁴ *Id.* I., 30.

it would have hardly any effect on the export trade. Merchants have their orders for distant countries; in many of these countries rice is a luxury rather than a necessity; and freight and other charges remaining the same, the prime cost of the articles less affects the whole price than in the case of consumers in this country. The exports would not be stopped by mere enhancement of price without reaching prices which must cause severe famine in the country.

The Governor General in reply¹ deemed it "sufficient to state that the Government of India have no intention of altering the policy which has been already laid down, and which has received the approval of Her Majesty's Government."

34. *Amount of exportation from Bengal.*—On the 5th January² the Lieutenant-Governor calculated that the exports of the year from Bengal would be from 150,000 to 200,000 tons, and that provision must be made for restoring that quantity by importation.

35. *Lord Northbrook's argument against prohibition.*—On the 30th January³ the Viceroy wrote a Minute, setting out in full his views on the subject, and the arguments which influenced him in the decision he had come to. As to prohibition of exports from all Indian ports, he did not think it necessary to discuss the proposal at length: Burma exports 700,000 tons annually, and to have stopped this would have been to inflict a fatal blow on its trade: Madras exports 100,000 tons of rice annually to Ceylon, which is consumed by Indian coolies, and Ceylon cannot be looked on as a foreign country. The question is therefore narrowed to Bengal, which in 1872-73 exported 526,000 tons; of this about 80,000 tons is "table rice"—a luxury; of the balance, or 446,000 tons of "common rice," 189,000 were sent to British Indian ports including Ceylon, 160,000 tons to the West Indies, Mauritius and other places, mostly for the use of Indian coolie emigrants; and the remaining 97,000 tons principally to England and the Persian Gulf. It would have been unjust to stop the supply of the usual food of Bengal coolies in the Colonies; and the whole quantity exported is small when compared with the consumption of 60 millions—some 30,000 tons a day. The prohibition would have excited confidence unduly and lowered prices, consumption would have been stimulated instead of being reduced, which is the natural effect of a rise of prices and the greatest safeguard against famine.

Even if this were not so, any advantage derived for the time would have been dearly purchased by the probable consequences for the future. An export trade in food-grains is a great advantage to a country like Bengal, since it ensures the production, in ordinary years, of more food than is required for the consumption of the people. The natural rise of prices in times of scarcity diverts a portion of the ordinary export for home consumption, and thus a reserve easily and readily available is habitually maintained. Thus the exports were—

	Tons.
in 1864-65	695,341
in 1865-66 (a year of scarcity)	336,211
in 1866-67	222,659
So, too, in the three months "October to December 1872 the exports were	113,277
while in the three months "October to December 1873 the exports were	64,425

"It follows that any measure that would diminish the export trade in common rice from Bengal would weaken the power of the country to meet any future period of scarcity. Trade is readily diverted from one channel to another. The interference of Government with its free course may easily destroy it. If we refuse to supply our ordinary customers at any price, we oblige them to have recourse to other markets, and it is impossible to assume that when we want them again they will return to us.

"Bearing in mind, therefore, the permanent harm that might be done by an interference with the export trade in food-grains, and being satisfied that the Government could without difficulty bring in a larger quantity of rice than is exported even in ordinary years, I had no hesitation in preferring the latter course, and I see no reason to doubt the correctness of the conclusion at which I then arrived."

36. *Concurrence of the Home Government.*—On the 23rd January⁴ the Secretary of State wrote again, referring to this subject, that "Her Majesty's Government desire to intimate their entire concurrence with you that the objections to this measure far outweigh any recommendation in its favour. . . . Nothing could justify such a measure, except certainty, or reasonable probability, that exports of food will so exhaust the resources of India as to render them incapable of affording the supplies which may be required for the affected districts:" and no such result was even probable.

¹ B. B. I, 115.² *Id.* I, 152.³ *Id.* I, 201.⁴ *Id.* I, 309.

37. *Exports from Bengal.*—The returns¹ of exports from Bengal for the six months October—March, give the following figures:—

	Table Rice.	Common Rice.
October 1872 to March 1873 - - - - -	Tons. 36,209	Tons. 239,337
.. 1873 .. 1874 - - - - -	26,271	129,996

ESTIMATE OF GRAIN TO BE IMPORTED.

38. *Earliest Estimates.*—The first estimate of the quantity of grain to be imported is contained in a letter from the Bengal Government, dated 11th November,² in which the Lieutenant-Governor says that he would like to be able to store, by the end of March, 50,000 tons. In the Special Narrative for November 28th it was stated³ that the Lieutenant-Governor had arranged for the purchase of 600,000 mannds (22,040 tons) in Bengal, Orissa, and North-Western Provinces, of which three-fourths were to reach the distressed districts by the end of December.⁴ The Government of India then invited him to frame an estimate of the probable quantity of grain required. This was done on the 2nd December.⁵ The population of the distressed districts was put at 25 millions, one-twentieth of which would consume 18,75,000 mannds (at two-thirds of a seer a day) in three months, or nearly 70,000 tons: of this the Lieutenant-Governor had ordered about 35,000 tons, and he looked to the Government of India to provide the remainder. If this quantity was imported, the Government would be able to prevent severe distress up to the end of April; and long before that (say by the end of January) it would be known how the spring crops were turning out and what the requirements of Government would be. To this the Government of India replied⁶ that the estimate of two-thirds of a seer per head per diem seemed too high, probably half a seer was enough, and this would reduce the requirements to 50,000, instead of 70,000 tons; but still that they did not propose to lower the estimate of 70,000 tons, as a margin is desirable; that Bengal had ordered 28,500, not 35,000 tons; that the Government of India had ordered more than the 35,000 tons⁷ asked for, but were not sure if it would arrive by the end of January; in any case the quantity asked for would come well within the period of three months

	Distribution of December 6th, pages 93-4.	Distribution of January 13th, page 106.
	Mds.	Mds.
Patna - - - - -	1,00,000	50,000
Gya - - - - -	1,00,000	1,50,000
Shahabad - - - - -	1,00,000	50,000
Tirhut - - - - -	2,00,000	2,75,000
Saran - - - - -	1,00,000	1,25,000
Champurān - - - - -	1,00,000	1,50,000
Soane Canal - - - - -	1,00,000	1,00,000
Gandak Embankment - - - - -	1,00,000	1,00,000
Monghyr - - - - -	1,00,000	1,00,000
Bhagalpur - - - - -	1,00,000	2,00,000
Purneah - - - - -	1,00,000	2,00,000
Dinajpur - - - - -	1,25,000	1,95,000
Rungpur - - - - -	50,000	70,000
Bogra - - - - -	25,000	20,000
Rajshahai - - - - -	—	20,000
Mulda - - - - -	—	20,000
Northern Bengal Railway - - - - -	1,00,000	1,00,000
Total - - - - -	15,00,000	19,25,000
Reserve - - - - -	3,75,000	
Total - - - - -	18,75,000	

beginning with 1st of February, and the rest would arrive in April and May. The Lieutenant-Governor replied that he was anxious to get the 70,000 tons sent up country, and placed ready for delivery before the end of January, so as to be prepared for the worst; for if the spring crops failed the area of distress would be extended to Central and Western Bengal, and it would be impossible then to convey more than 200,000 tons into Behar and Northern Bengal by any Government agency before the rains began. He therefore urged that the despatch of the 35,000 tons from Burma should be expedited as much as possible, so as to arrive before January 31st. This the Government of India promised to do. The Lieutenant-Governor then provided for the distribution of this grain: 9 lakhs of maunds to the Patna Division; 3 to Bhagalpur; 3 to Rajshahai; and the balance (3½ lakhs) to be kept as a reserve.

¹ B. B. I, 362.

² *Ib.* I, 63.

³ *Ib.* I, 40.

⁴ *Ib.* I, 87.

⁵ *Ib.* III, 15.

⁶ *Ib.* I, 89.

⁷ They had ordered 80,000 tons at the time (see letter to Secretary of State, paragraph 12, page 86), but apparently thought it better not to let Bengal know the exact quantity.

39. *Increased Purchases in Bengal.*—On the 3rd of January,¹ the Bengal Government reported that through divers causes, such as misconception of orders and a desire to preserve a safe margin lest some orders should fail to be executed, they had directed the purchase of 13,62,000 maunds (or 50,000 tons) instead of the 38,000 tons formerly arranged for. From this time the purchase of grain for famine requirements was entirely taken over by the Government of India, the care of providing transport and forwarding the grain to the distressed tracts being left to the local Government.

40. *Estimates considered too low by Secretary of State.*—About this time was received an important despatch from the Secretary of State,² dated December 1st, in which the following passages occurred :—

“Repeated experience has sufficiently proved that, when scarcity and the danger of famine arises in India, the ordinary operations of commerce and the ordinary processes of supply and demand cannot be relied on for any adequate supply of food to the affected districts, and that, without the active intervention of Government, the worse consequences are liable to ensue.

“Scarcity in India is apt to outrun in its amount and in its effects all previous estimates of the danger, and if your Government is determined to secure in time an amount of food fully equal to the largest deficiency which can be calculated upon, it will be able to draw upon an adequate supply.”

This despatch was necessarily understood as suggesting a still ampler provision against any mishap, and it could not but diminish the inclination of the Government of India to study economy in its measures.

41. *Revised Estimate by Sir G. Campbell.*—On the 5th January,³ Sir G. Campbell sent up a revised estimate of the wants of the country. He considered that on the whole the country had enough food in it to support the population, but that the exports from Bengal across sea (which he calculated at 150,000 tons) would have to be replaced, and some further amount supplied to Benar. He thought it necessary to provide for a continual flow of food towards the distant and most affected tracts—and for a reserve of food for the districts nearer the seaboard and in more accessible regions, which might be drained by such a supply, as well as by the exports across sea. Including the quantities already imported, he designated 350,000 tons as the amount likely to be required :—

	Tons.
For the more remote distressed districts where famine has been worst	- 125,000
To replace supplies sent from Bengal to the same places	- 75,000
To replace grain exported over sea	- 150,000
Total	- 350,000

The Government of India replied⁴ (January 6th) that provision had already been made for 75,000 tons beyond the 70,000 tons previously mentioned, and that this would arrive before the end of April.

42. *Amounts purchased up to end of January.*—On the 30th January,⁵ in a despatch to the Secretary of State, the Government of India reported what they had done up to that time. Beginning with the explanation that whereas their first intention had been to provide grain only for labourers on relief-work, leaving to the Relief Committee the purchases required for gratuitous distribution, they had afterwards decided (as it was not considered desirable to constitute the Central Relief Committee so soon) to provide supplies of food for all relief operations, the Government went on to state that up to that time Bengal had bought 50,341 tons, and they themselves 291,500, of which 47,000 had arrived; and this was exclusive of considerable quantities purchased by the courts of wards and by planters, zemindars, &c., with the help of advances received from Government. This provision, they say, was based on the calculation that the affected population was twenty-five millions; that the largest number ever known to come on relief of all kinds whatsoever had been 10 per cent. or two and a half millions, and that the food of that number at 1 lb. per day for seven months, amounted to 240,000 tons. They had further provided a reserve of 100,000 tons.

¹ B. B. I, 116.

⁴ *Ib.* I, 155.

² *Ib.* I, 121.

⁵ I, 198-9.

³ *Ib.* I, 150.

43. *Sir R. Temple raises the Estimates.*—On the 31st January,¹ Sir R. Temple wrote, concerning Tirhut, the first of a long series of minutes in which he dealt successively with the probable wants of each of the distressed districts. The Tirhut District contained a population of four millions of people and had received, on Sir G. Campbell's distribution of January 13th, an allotment of 275,000 maunds. The estimate now made of its requirements was four millions of maunds. The local officers calculated that they might have a million of people on their hands, receiving relief in some shape or other; the worst months would be May and June, but the months of April, July, August, and September would be almost as bad; to feed a million of persons for six months would require three and a half million of maunds; altogether it would be safer to provide four millions; and to ensure getting this quantity it was necessary to make contracts for the transport of five millions. Sir G. Campbell demurred to this estimate as excessive: it assumed that 25 per cent. of the population of the whole district, and 50 per cent. of that of the part most distressed, would be on relief—a proportion never known before; it made no allowance for reserved stocks or for the quantity, small as it was, produced in the harvest; it took no account of private trade which was however fairly active; and it reckoned on giving 4 maunds of food (or $1\frac{1}{2}$ lbs. a day for seven months) to each person on relief, whereas he himself considered that to allow 1 lb. per day or $1\frac{1}{2}$ maunds per head for four bad months was sufficient.² Finally, Sir G. Campbell held that if two million maunds were sent to Tirhut, it would be ample, and probably this (or 1,00,000 maunds a week) would be as much as the district resources could accomplish. The Governor General replied³ that he was much disappointed to find that the district officers had “so long neglected fully to appreciate the requirements of those parts of the country,” that Sir R. Temple had—

“exercised a wise discretion in recommending that four millions of maunds of grain shall be provided for the district of Tirhut, and that arrangements should be made for the transport into the interior of a larger quantity, in order that the probability that part of the transport arrangement will break down may be guarded against beforehand.”

Sir George Campbell made no further expostulation against Sir R. Temple's estimates.

44. *The Viceroy approves increased Estimates.*—On the 13th February,⁴ the Government of India reported to the Secretary of State, with an expression of their full approval, Sir R. Temple's estimate of the needs of Champáran—one million maunds to feed an average of 217,000 persons⁵ for eight months at $\frac{3}{4}$ seer a day, and 6,50,000 maunds for Saran, of which 1,50,000 would be provided by the Hatwa Raja for his own estate. This, added to the amount already estimated for Tirhut, brings out a total of about 180,000 tons required for North Behar: the Government had already made arrangements for this quantity, and had no doubt they would be able to lay it down before the 15th June.

45. *The estimate for Purneah.*—It is unnecessary to particularise all of these estimates necessarily made by Sir R. Temple in extreme haste and based on the best information he could obtain, though he himself fully admitted the imperfectness of that information. One more instance will suffice—that of Purneah. In this district he estimated that half the population were not likely to be distressed at all, and that less than half of the remainder would be severely distressed, and he recorded⁶ that “the “distressed tracts are receiving much benefit from private trade, are easily accessible by “means of a trunk road and a navigable river (Mahanadi) and are close to tracts blessed “with good harvests.” The Collector estimated that 130,000 persons would need relief, 85,000 of them being in the distressed tracts, and this estimate was “carefully made “with percentages separately taken out on each caste or class as given in the Census “Statement.” The Commissioner raised the estimate to 150,000. Sir R. Temple, following the Behar precedents, calculated that the number on relief would be 240,000,

¹ B. B. I., 224.

² Mr. Metcalfe (Additional Commissioner for Behar in 1874) states that from 1 to $1\frac{1}{2}$ lbs. is the ordinary food of an able-bodied person, but that he found from actual sales in the famine that 10 oz. per head per diem was enough, and in future estimates he should reckon 10 seers per month, or $1\frac{1}{2}$ maunds for six months, a sufficient supply. (Reply to Famine Commission.) Mr. Kirkwood writes to the same effect, that $1\frac{1}{2}$ lbs. was an excessive allowance. And Mr. Magrath states that in Madhobaui the actual ration given in poor-houses was 1 lb. of rice to an adult, and half to a child.

³ B. B. I., 230.

⁴ *Id.* I., 241.

⁵ On the assumption that from 5 to 10 per cent. of the population of different parts of the district would come on relief.

⁶ B. B. III., 268.

and that over 23,000 tons must be imported to feed them. What was the result? The largest number in receipt of direct relief at any one time was¹—

On relief-works in May	-	-	-	31,029
On charitable relief in July	-	-	-	36,180
				<u>67,209</u>

The average number relieved daily for seven months was—

On relief-works	-	-	-	18,230
Charitable relief	-	-	-	14,643
				<u>32,873</u>

Besides this, Rs. 1,13,125 was advanced in cash; 4,587 tons of grain were lent and 10,762 sold (a part of which, however, was sold after relief operations were over). Assuming that every 23 seers sold or lent, and every sum of Rs. 1-14 lent, supported one person for a month, the number relieved in this way for seven months was 115,367, making a total of 148,240 in receipt of relief of all kinds; a number a little above the Collector's estimate and far below Sir R. Temple's. When it is considered that many received relief in different forms and are counted twice over in this calculation, and that much of the relief that was given proceeded directly from the largeness of the means of relief provided (the grain having to be disposed of somehow), the logical conclusion seems to be that the Collector's estimate of the real wants of his district was as much above the mark as it was held to be below it.

46. *Amount required by increased estimates.*—On the 27th February² the Local Government represented that the following allotments, made in accordance with Sir R. Temple's minutes and requirements, had almost swallowed up the 340,000 tons provided, and that it was necessary to arrange for a reserve—

	Tons.
Tirhut	148,000
Champaran	37,000
Saran	18,500
South Behar and Soane Canal	18,500
Bhagalpur	25,900
Monghyr	11,000
Purneah	18,500
Rajshahai Division	55,500
Total	<u>332,900</u>

In some of these districts the requirements might be fixed still higher before Sir R. Temple finished his tour; and besides these there was cause for anxiety about the drain on Eastern and Central Bengal, in which parts prices were rising. The Viceroy replied³ that he had made the necessary arrangements, and from a despatch of March 20th it appears that altogether 465,000 tons had been arranged for, of which 385,500 tons were to come from beyond sea, and 160,000 tons had already arrived. This increase in the quantity purchased, it is explained, was mainly due to Sir R. Temple's calculation that 1½ lbs. and not 1 lb. should be taken as the average daily consumption. Of the whole sum provided (which is put elsewhere⁴ as 453,000 tons, independent of purchases by Rajas, Zemindars, &c., with funds advanced by Government) 280,000 tons had been ordered from Burma.

47. *Lord Salisbury finds the increased estimates too low.*—On the 19th March⁵ a despatch was written by the Secretary of State urging a large provision of grain. He referred to a telegram of March 4th, which ran—

* * * “The area of probable severe distress now well ascertained comprises parts of districts of Tirhut, Sarun, Chumparun, Bhagulpore, Purneah, Dinagepore. Expect at the worst period to have something under three million persons on the hands of Government in these districts for three months, from end of May to end of August, a smaller number during April, May, and September, and still fewer in March, October, and November. There will be distress in nine other districts, but it will not be general. Orders of Government rice amount to 420,000 tons, of which 350,000 from beyond sea.”

“Para. 5. The best authorities appear to agree with Sir Richard Temple in fixing the average ration necessary for the support of persons under relief at three-quarters of a seer of rice a day. According to the estimate contained in your telegram you would therefore require for the three months of severest pressure a total quantity of 185,000 tons. If three-quarters of this pressure be assumed for the three months which you place next in severity, and half this pressure for the three months of lightest scarcity, the total amount of rice required, supposing that you have provided no other grain,

¹ MacD., p. 207.

² B. B. I., 293.

³ Ib. I., 315.

⁴ Ib. I., 322 (April 2nd).

⁵ Ib. I., 355.

will be 413,000 tons. Sir Richard Temple, in his minute of the 31st January, upon the distress in Tirhut (see page 224), states that in most parts of Mudhobunnnee, and in some parts of Durbhauga, the distress will not disappear at the earliest till December; and in these two districts alone he calculates that it will fall to the Government to support more than 800,000 persons. It will not be safe, therefore, to assume for the closing months of the distress less than half the pressure of the famine at its height.

"6. If these conclusions are a just inference from the figures with which you have furnished me, it results that you have a supply of 420,000 tons of rice to meet a demand which you estimate at 413,000 tons. But this is the demand of the six most afflicted districts only. You observe that there will be partial distress in nine other districts. Sir Richard Temple apprehends (5th February) that half a million distressed persons from Nepal may come to the relief-works and the rice stores of your Government. Moreover 720 tons a week are destined (14th February) for Gya, Arrah, and the Soane Canal; 25,000 tons have been allotted (12th February) to the districts Rajshahye other than Dinagapore, and the Lieutenant-Governor is anxious to retain 20,000 tons reserve to meet the probable want of Eastern Bengal. I observe also that Government grain is being stored in Chota Nagpore and that relief-works have been commenced in Burdwan, and that severe distress is reported to exist among the Sonthals. It is obvious, moreover, that, as prices advance, the distribution of Government grain cannot be confined to those who are 'on our hands,' that is to say, who are in the receipt of the wages or the alms of Government. There will be numbers who have money, or can procure enough to enable them to work on their own land, if only they can turn that money into grain at a reasonable rate, and against these the Government cannot safely close its stores. * * *

"7. Even, therefore, if no disturbing cause should derange your calculations, and if I may assume, from your silence as to provision of any other grain, that you do not in them rely upon any such provision, it seems probable that 420,000 tons will fall considerably short of the quantity required. But with the starvation of multitudes as the possible penalty of a mistake, I am convinced that you will not trust to any exact calculation. There are numerous contingencies which may diminish your supply, or may increase the demand upon you. A liberal allowance must be made for the possible failure of the arrivals on which you count, for the shrinkage of transport, for the chance of accident, for the loss that may result by the damage of rice by rain, for the mistakes of those who act under you. On the other hand, it may possibly be that the calculation on which you are relying will fall short of the truth. The area or the duration of the distress with which it is your duty to deal may be larger than you anticipate. Past experience will not lead you to place unbounded trust on the estimates that are supplied to you.

"These inadequate appreciations led you in November last confidently to name 2,500,000 as the number to be relieved. In March you raised that estimate under the guidance of fuller information to 3,000,000. It is impossible to assume with certainty that the tendency to an inadequate appreciation of the danger, which you have already noted in some of your local officers, has altogether ceased to operate.

"8. These considerations lead me to apprehend that your supplies, as hitherto reported to me, are not sufficient to protect you against the possibility of a serious deficiency. They may be adequate if the most favourable anticipations should be justified by the event, but if any unforeseen aggravation of your difficulties were to occur, your Government might be involved in embarrassment of the greatest character. * * * I have no wish to limit your discretion as to the mode of providing the requisite supplies, but I request you to take early measures for securing not only the quantity indicated by your present calculations, but also a very ample margin to meet contingencies, the exact nature of which it is impossible to foresee, but which in an emergency of this magnitude are in some form or other likely to occur."

48. *Government of India refuses to raise its estimates.*—The Government of India replied¹ on the 24th April, stating what had been decided on up to date. Sir R. Temple in his minute of 28th March had given a summary of his estimates of the area and requirements of the distressed tract—

DIVISION.	DISTRESSED AREA.		Population likely to come on relief at worst time.	Percentage to distressed Population.	Percentage to Total Population.	Grain allotted.
	Square Miles.	Population.				
Patna - - -	16,666	8,124,164	1,794,000	22·08	13·67	Total. 241,000
Bhagalpur - -	7,623	2,957,607	746,650	25·24	11·29	70,000
Rajshahni - -	8,098	3,491,936	802,863	20·87	8·2	77,000
Total - - -	32,387	14,573,707	3,343,513	—	—	388,000

Besides this, about 9,500 tons more had been allotted to Hazaribagh, making a total of 397,500 tons allotted, of which 50,000 were intended for a reserve. The Government

¹ B. B. I., 358.

had, however, purchased or ordered 490,000¹ tons, making a reserve of 142,500 tons.

They went on to explain that the number of persons expected to be on the hands of Government included the classes of whom the Secretary of State had spoken, whose needs would be satisfied with permission to buy the Government grain; that though their estimate of the number to be relieved, at the worst time, had risen from two and a half to three and a half millions, they expected that the numbers would be very much smaller during a considerable part of the seven months period; and that in fact in April, the second month of the seven, the number on relief was 1,200,000, or about half the estimate, and the issues of grain from Government stores had been as yet inconsiderable. On the whole, therefore, the Government of India declined to increase its purchases.

49. *Account of Burma purchases.*—On the 9th July,² the Chief Commissioner of Burma (Sir A. Eden) having completed the duty entrusted to him of purchasing grain for Bengal, reported on the whole history of the transaction. The exports from Burma in previous years had been—

					Tons.
1870	-	-	-	-	364,555
1871	-	-	-	-	477,984
1872	-	-	-	-	660,435
1873	-	-	-	-	604,325

The crop of 1873, to come to market in 1874, was an unusually fine one, and was estimated at 750,000 tons for export; of this, about 100,000 tons is usually taken for China and the eastern parts, and tonnage had been taken up to carry 400,000 tons to those countries and to Europe. This left 350,000 tons available for purchase by Government. Altogether 289,534 tons were purchased and shipped. This was done through the agency of two local firms whose business it was to purchase the rice on Government account at market rates (subject to constant communication with the Chief Commissioner), to prepare it for export by husking and cleaning, to pack it in gunny bags and place it on board ship at the port of despatch: for this they received a commission of 3 per cent. on their outlay. In January and February the shipments averaged 1,000 tons a day, in March they reached 3,000, in April and May they averaged 2,000. On one occasion a steamer of 1,700 tons loaded in 26 hours. The average cost of all the rice from first to last, when placed on board ship, *i.e.*, "free on board," was Rs. 2-10-11 per maund; it was cheapest between the 15th January and the 6th March, at which time the heaviest purchases were made. The freight from Rangoon to Calcutta varied from Rs. 10 to Rs. 14 per ton.

50. *Further Demands from Bardwan in September.*—On the 19th September,³ Sir R. Temple reviewed the condition of things in Hughli and Bardwan, in which Districts the holding off of the rains had brought up the numbers largely. There were then 75,000 people on relief in Bardwan and 45,000 people in Hughli, almost all on charitable relief, and it was admitted that they were in good case, that the pressure had been very slight, and that many people had learnt the arts of imposture. Accordingly, it was intended to administer relief with greater strictness, and it was hoped that the numbers would fall by one-third in October, by a half in November, and by three-fourths in December. It was calculated that about 4,000 tons would be required to

feed the numbers thus estimated, and though admitting that the habit of importation existed, and that the advantages of trade and communication were first-rate, Sir R. Temple proposed to draw this grain from the Government reserve in Calcutta, instead of buying it locally. The Government of India, however, refused this application, and directed that purchases should be made in the local markets. "His Excellency in Council considers it of minor importance that some surplus stock should be left upon the hands of Government; it was always contemplated that this would be the case."¹

51. *Stocktaking of Surplus Grain.*—On the 15th September,² stock was taken of the Government grain in store, and it was found to amount to 90,000 tons.³ Of this, it was estimated that about 23,000 tons would be used before the relief operations ceased; some 28,000 tons were scattered about the distressed districts in hundreds of petty granaries, this was to be sold locally to the best advantage; the remainder, 39,000 tons, was collected in considerable quantities in large depôts, and this the District officers were directed to sell, from time to time, between October and March. It was hoped that this grain would realise Rs. $1\frac{1}{2}$ to $1\frac{3}{4}$ per maund.⁴ These stocks were independent of the Government reserve of grain in Calcutta, which also was advertised⁵ for sale on different days during November, December, January, and which amounted in all to a little over 20,000 tons (595,000 maunds exactly).

52. *Summing-up of the Story.*—In his final minute,⁶ Sir R. Temple computes that altogether 460,000 tons of Government grain were imported into the famine tract (exclusive of the reserve in Calcutta), of which about 105,000 would be unexpended at the end of October. The total expenditure⁷ up to the first week of October had been 343,000 and possibly 15,000 tons more might be required. The surplus was about 85,000,⁸ or including the Calcutta reserve 105,000 tons; this amounts to about 20 per cent. on the total provision of Government grain. This surplus was estimated to bring in Rs. 37,00,000, or Rs. 35–4 a ton, about a quarter of what the grain cost the Government.

"If all the circumstances are considered, if all the necessities to be met are borne in mind, the surplus will not appear excessive. At two very critical periods the Government were not without grounds for fearing that the total provision of grain might not suffice. Towards the end of May there was hardly a responsible officer in the very distressed Districts who considered that the provision of grain for his district or sub-division was too large; and there were many who thought their provision would not suffice. During the last days of August again, and the first days of September, there was a very general belief that the supplies of grain then in store would be inadequate, and that fresh Government importations would have to be begun.

"In previous Indian famines, the months of September, October, and November, have been marked by very high prices and by some misery and even mortality. Experience, therefore, warned us to guard against such contingencies. The unusual breadth, and the generally abundant produce of the early autumn crops of 1874, constituted, as above observed, the main cause of the cessation of the demand for Government grain about the end of September or the beginning of October. Another cause, as already seen, was the relief given so constantly throughout the summer months helped to enable the people to support themselves six weeks earlier than was expected in February 1874."

53. *Cost of the Grain.*—The purchase⁹ of this grain (480,000 tons) is stated to have cost 440 lakhs of rupees or Rs. 91 $\frac{1}{2}$ per ton, or 12 $\frac{1}{2}$ seers per rupee, or Rs. 3–5–11 per maund. The Burmese rice, 290,000 tons, cost only Rs. 2–10–11 per maund at the port of export, or 213 lakhs in all; so that the remaining 190,000 tons must have cost 227 lakhs of rupees, or Rs. 120 per ton, or 9 $\frac{1}{2}$ seers per rupee. Possibly, however, the freight to Calcutta of the Burmese rice, which was more than 30 lakhs of rupees, is here included in the cost price. Including the cost of transport, the total sum spent on the purchase and delivery of these 480,000 tons was Rs. 6,47,40,000, or Rs. 135 per ton,¹⁰ or 8 $\frac{1}{2}$ seers per rupee. The cost of transport was about Rs. 42 per ton, or almost 50 per cent. of the cost of purchase. These figures agree closely with Mr. Bernard's estimate of February 13th, according to which 340,000 tons would cost three millions sterling, and transport would cost Rs. 42 $\frac{1}{2}$ per ton.

¹ B. B. II., 50.

² *Ib.* II., 53.

³ Afterwards stated as 100,188 tons, in Sir R. Temple's final minute. See B. B. II., 109.

⁴ The author of the Black Pamphlet says that much of this grain was sold at from 30 to 50 seers per rupee, and that some was taken down by the purchasers to Calcutta and sold at a profit there. Mr. Lewis, who was Magistrate-Collector of Dinajpur in 1874, says that the Burma rice could hardly be got rid of at 4 annas per maund.

⁵ B. B. II., 55.

⁶ *Ib.* II., 98. (T.)

⁷ *Ib.* II., 109. (T.)

⁸ Apparently this leaves 17,000 tons to be accounted for by "shrinkage." ⁹ *Ib.* II., 110. (T.)

¹⁰ Colonel Burn states (Reply to Famine Commission) that his importations on behalf of the Darbhanga Raj cost Rs. 205 per ton, so that Government worked cheaper than he did.

SALE OF GRAIN TO THE PUBLIC.

54. *First Suggestion in December.*—The first attack on the principle that the Government grain was only to be given to labourers on relief-works, was made by Mr. Robinson, the Relief Commissioner of Rajshahai, who reported¹ on the 2nd December that in a large part of Dinajpur the stocks were small; there were no traders who could import from a distance; and there would be a great want of rice in a couple of months; he, therefore, recommended that Government should import largely to a central depôt, and sell at the market rate or slightly under it to petty dealers, village headmen, &c., who would themselves carry the grain to the villages and distribute it to their families, dependants, and others. The Government of India replied² (January 12th) that, although this proposal was not “in principle opposed to the policy of Government in exceptional localities, there was not sufficient evidence to show the expediency of carrying it out in the District concerned;” they doubted the non-existence of capable traders, and they considered that the Zemindars ought to be stimulated to take advances in order to do this work.

“But it should be understood publicly that the stores of Government grain are either for relief-works or for relief committees, and for no other purpose, so that any discouragement may be avoided as regards any local trade which may exist or may yet spring up.”

In the conference held on January 8th, the Viceroy thus expressed his views on the subject:—

“He thought it most essential that no idea should get abroad that Government was going to open stores and take upon itself the task of feeding the whole population. All the Government could do would be to supplement the action of private trade. This could not be too distinctly understood. But in special limited Districts, where from one cause or another private trade might be found not to bring in supplies, Government might, he thought, properly sell grain at its price at the nearest large grain mart, with the addition of something for carriage, as was done in the Irish famine. The sale of Government grain in this manner would continue until the supply brought in by private trade was found sufficient to meet the wants of the people. It would then at once be discontinued, and the grain in Government stores would be devoted to its legitimate object, namely, the supply of food to people engaged on Government relief-works, and the distribution through the relief committees of gratuitous relief to that limited portion of the population who stood in absolute need of it.”

55. *Sale permitted under conditions.*—On the 26th January, the rules¹ issued for the guidance of the local Relief Committees permitted them to sell grain below the market rates, or to advance it as a loan to people whose caste usages and feelings preclude the application of a labour test, and who are in great distress; or, if a serious deficiency of grain is apprehended, they might arrange to sell grain to local traders, fixing the price according to that of the nearest market plus cost of transport; such sales to be stopped as soon as local trade receives sufficient supplies.

56. *Probability of more general sale considered.*—In the estimate framed² on 13th February, in which allowance is made for the purchase of 340,000 tons of grain, it is admitted that the stock thus laid in is very much in excess of the probable requirement of relief labour alone.

“It is quite clear that labourers on Government works alone will not be numerous enough to consume more than a small proportion of the Government provision of grain. There will, therefore, be a good deal of grain available for sale for those who can buy in parts where private trade does not supply the markets, over and above what may be required for charitable distribution. Some of the grain will, perhaps, be left unsold at the end of the famine, if happily Behar and Bengal have a good summer crop. Reckoning on a fair summer crop, Government may, perhaps, estimate the proceeds from sale of grain, and from the yield of surplus stores at the end of the famine, to approach a crore.”

57. *Conditions further relaxed.*—In the end of January Mr. Robinson again brought forward his proposal to sell Government grain in Dinajpur to the public.³ He argued that with the prices then current at Calcutta, it could not pay any trader to bring up grain to sell in Dinajpur at 10 seers per rupee; especially as no habit of importing exists and “trade connexions are not formed in a month or two.” “There is some money in the country, and very little grain; if the people can get rice within a reasonable distance at a fair price, they will go and buy it and take it themselves to their home (or to neighbouring markets if petty dealers) and so supply places difficult of access. If Government does not do this, it may have to feed at least 70 or 80 per cent. of the population, whereas if rice is sold, I firmly believe that 50 or 60 per cent. would provide for themselves.” He urged that as an experiment Government should allow one Relief Committee to sell 10,000 maunds in February at the rate of 10 seers per rupee, selling not more than 50 maunds, and not less than one bag to any one person. In reply to this, the Government of Bengal on the 18th February

¹ B. B. I., 151.² B. I., 300.³ B. I., 155.⁴ B. I., 235.⁵ B. I., 165.⁶ B. I., 244-250.

(with the sanction of the Supreme Government) permitted the sale of grain wholesale (leaving it to the people themselves to distribute it retail) as an exceptional case under two conditions: (1.) That Government has large enough stores to do this without stinting its relief-works and poor-houses; (2.) That there is an absolute dearth of grain in the country, and a want of trade at the chief marts, but a sufficiency of local trade and local activity to distribute the supplies sold by Government. Care must, however, be taken that the food grain does not fall into the hands of monopolists who will hoard it up for their own profit. The quantities thus sold may vary from 20 seers to 10 or 20 maunds as a rule. The difference between these sales and those sanctioned by the rules of Relief Committees would be that in this case the sales would take place at large central marts, in the other, the grain sold has been brought by Government close to the people's doors as a provision for a relief circle of very moderate area.

58. *Sales made general.*—In March¹ authority was given to sell grain to the public in specified parts of east and north-east Tirhut, in north-west Champáran, in north Bhagalpur, and in parts of Purneah, Dinajpur, and Rangpur, at the rate of 10 seers per rupee, subsequently lowered to 12 seers in April.² But during all April less than 10,000 tons were sold.³ Private persons were allowed to purchase direct from the Government granaries; but generally⁴ grain was sold to dealers for retail distribution to the public, and when sold wholesale the rate was slightly reduced. In May the area in which such sale was permitted comprised nearly the whole of the districts named above, as well as Malda and Bogra; besides smaller parts of the other "partly distressed" districts. "It was never authorized in south Tirhut, Shahabad,⁵ Bardwan, Birbhum, Hazaribagh, Patna, or in some parts of Saran, Purneah, Dinajpur and Rangpur. On the whole, it was authorized in about one-third of the area of the distressed districts, not in the remaining two-thirds. Up to June 10th, the sales to the public amounted to 47,389 tons."⁶

59. *Amount sold.*—The quantity of grain sold after this date is as follows:—⁷

	Tons.
Sold up to 10th July	74,836
" " August	95,858
" " September	116,941
" " 1st October	118,107

This accounts for grain sold to the public or to labourers, and does not include grain given to labourers in lieu of wages. In August and September the prices were lowered to 13 and 14 seers per rupee, and the final sales must have been at lower rates than these.⁸ The price obtained by these sales is stated⁹ to have been 95 lakhs of rupees or Rs. 80·8 per ton, or 13 $\frac{3}{4}$ seers per rupee.

PRIVATE TRADE.

60. *Extent of its activity.*—The degree of activity of private trade inland (*i.e.*, at a distance from the railway) is somewhat disputed, as has been seen by the conflicting quotations given above; but there is no question that it was extremely brisk along the line of the Railway. At one time, 50,000 tons a month were being brought in from the North-Western Provinces alone to Patna, and the following is Sir R. Temple's estimate¹⁰ of the total imports from October 1873 to October 1874:—

	Tons.
By Railway—	
From Bengal upward to Behar	157,226
From Northern and Central India to Behar ¹¹	225,952
By River—	
From Bengal to Behar	44,886
By River and Road—	
From Eastern Bengal into Northern Bengal	101,000
Total	529,064

¹ B. B. II., 84. (T.)

² It was reckoned that the grain as delivered in local granaries cost nearly 8 $\frac{1}{2}$ seers per rupee or 8 seers of clean grain.

³ *Id.* II., 84. (T.)

⁴ *Id.* II., 96. (T.)

⁵ It was however sold in the District to the extent of three-fourths of the import. (MacD. p. 39.)

⁶ *Id.* II., 97. (T.)

⁷ *Id.* II., 106. (T.)

⁸ Mr. Kirkwood states that in Bhagalpur in July the price of Burma rice was lowered to 16 seers per rupee for the public generally, and 20 seers per rupee for the traders.

⁹ B. B. II., 110. (T.) But Colonel Burn, Manager of the Darbhanga Estate, sold at Rs. 98 per ton to his ryots.

¹⁰ *Id.* II., 97. (T.)

¹¹ This was afterwards calculated to have amounted to 289,000 tons. See Resolution of 13th February 1875 (II., 64).

So rapidly were these stores disposed of and dispersed that when the Commissioner of Putna made enquiries with the view of purchasing locally for Government in that market, he found very little stock in hand, and was convinced that any intervention of the kind would greatly affect and paralyse the trade.¹

"This large total shows that private trade has been active beyond the anticipations of most people, and has fully justified the confidence placed by the Government of India at the beginning of the affair in the resources and enterprise of private dealers. It has been already explained that prices were everywhere so high that private traders could not afford to carry grain by long land journey to markets far from the railways or great rivers; and that consequently private importation scarcely penetrated to the most remote and distressed parts of North Behar and Northern Bengal. But the private importation, as just shown, fully supplied the broad and densely-peopled tract near the railways, and left the Government free to concentrate its supplies and resources mainly on the most distressed tracts."

It can hardly be questioned, after a consideration of these facts, that there was no necessity for importing Government grain into the districts which lie on the Railway, such as Shahabad, Monghyr, Bhagalpur, Bardwan, &c., and there are many others off the line in which trade was active. In Saran the traffic registration shows an import of 65,000 tons, and in March it was officially reported that the bazaars were abundantly supplied with grain; in Champaran private trade was active throughout, as the District lies, for its whole length, along the bank of the Gandak, a stream navigable at all times of the year: even into Darbhanga, according to Mr. Mac Donnell's estimate, 30,000 tons were imported by merchants. Purneah has already been mentioned. And while it is conceded that in the extreme north of Behar trade did very little or nothing towards importing grain it must be remembered that it could not have done this if it had been ever so actively inclined, since Government had taken up all the transport of the country.

In his final minute Sir R. Temple speaks² thus of the cessation of private trade in North Behar—

"During all May and the first week of June there was hardly any rice and very little food-grain of other kinds in the markets of the interior of North Behar and North Bengal. In these tracts the petty retail dealers found their occupation gone, and were glad to act as agents for the distribution of Government rice by sale among the people. The strange spectacle was presented of a whole class of native traders being converted into a Government agency."

"When the rains set in after the first week of June some private stocks were brought out. Of these, a part belonged to individual zemindars and others, and was used for the payment of wages of agricultural labour; a part belonged to traders and was sold in the market. Such sales were, however, comparatively insignificant. After a time they ceased. The markets became quite empty again, and remained so until the new grain of the August and September crops came in."

RELIEF-WORKS.

61. *Rates of wages.*—In the early part of the famine administration the relief-works were carried on on the system of paying daily wages and exacting a sufficient task in return, and the rule was that the ordinary rate of wages should be paid. At this rate an adult male labourer received 2½ to 3 annas a day in Rangpur, and from 1½ to 1½ annas in Champaran.³ In Dinajpur⁴ it was 2½ annas for men, and 2 to 1½ and 1 anna for boys. In February the Central Relief Committee⁵ made a representation to the effect that wages ought not to be fixed at too attractive a rate, and should bear a close relation to the price at which food could be bought. Sir G. Campbell agreed that relief wages should never suffice for more than a mere maintenance, and should have reference to the price of food. But no definite rule could be laid down till it was ascertained whether it was the habit of the district for women and children to work; and when food was extraordinarily dear near any relief-works, wages should not be raised to an exorbitant rate, to enable labourers to buy, but food should be supplied at reasonable rates. It does not appear, however, that any fixed scale of relief wages or any sliding scale following the movement of prices was laid down by the Government of Bengal either for any district or for the whole famine tract.

62. *Women at work.*—The question whether it was the habit for women to work on the roads in Behar was settled by Sir G. Campbell's visit in March.⁶ He passed through crowds of tens of thousands of women employed on relief-works without a complaint being made on the score of caste. He considered it indeed a proof of hard times that these women came to the works, but saw no symptoms that want had driven the better classes to great extremities.

¹ B. B. II., 97, 98. (T.)

² *Ib.* II., 106. (T.)

³ *Ib.* I., 101.

⁴ *Ib.* I., 186.

⁵ *Ib.* I., 257-8.

⁶ B. B. I., 304 (March 18th). "This was written in reference to a sensational telegram to an English newspaper about 'hundreds of high-caste women to be seen labouring in the Government relief-works.'"

63. *Classification of workers.*—In his minute of March 28th, Sir G. Campbell remarked¹ that the in-rush of large numbers had been such that the local organization was unable to prevent great abuses. “Women and children came on the works quite as readily as men, and it is because the whole family work or pretend to work that somewhat low wages” with dear food are not incompatible with an almost liberal measure of relief, measured by the fare to which the people are accustomed.” But it was essential to put an end to this demoralizing state of things, for “when under pressure of such a necessity” a lax system is established, and every one down to the smallest child gets paid for the “merest pretence of work (with probably a good many abuses besides), the thing becomes too attractive; the whole country tends to come on the works; the numbers threaten to be absolutely overwhelming.” His system was to divide the works into two classes, the one under Public Works Department or other competent officers, on which real labour is exacted and full wages paid, the other under circle officers, where the labour is less effective and the rates of wages are mere subsistence rates, or else easy piece work is given for liberal terms. *Primi facie*, daily payments are best, but with such large numbers either payments must be made only to heads of gangs, which opens a field for cheating, or else, which is better, the labourers should be paid every second or third day.

64. *Relation of Public Works Department with Civil Department.*—With regard to the responsibility of the management of large relief-works, he says²—

“It is to be thoroughly understood that not only are the officers of the Public Works Department employed in districts where scarcity prevails, wholly and absolutely under the Commissioners and superior Civil officers of Districts on all points in which they may think it desirable to interfere, but that everywhere the local sub-divisional officers and their assistants are directly responsible to see that payments are properly made and work given in the manner most conducive to relief * * * The Public Works officers will ordinarily arrange for payment of the men employed under them, but the local Civil officers will inspect the works, test the payments of the Public Works subordinates, and see that all is right. If not right, they will at once communicate with the Public Works officers, and if necessary with their own official superiors.”

The following is an instance of the vigorous measures taken to ensure that the Public Works Department officers should learn the difference between the system to be pursued on relief-works and that of ordinary years. The Executive Engineer of Tirhut having made no provision for frequent payments, and it being shown that on some of his works the coolies had received no wages for fifteen days, he was severely censured and removed from his appointment.³

“The Lieutenant-Governor is of opinion that the maladministration in this matter was most serious, for he thinks that it is to the delay in making the works acceptable, popular, and sufficient as relief-works, that the fact of the famine having gained on us in Tirhoot is mainly due. It is clear that sufficient work was not offered on sufficiently attractive terms, in proportion to the prevailing distress during the early stages of the scarcity in that district. Considering the very decided and clear terms of the orders issued by the Government on the 29th October 1873 and subsequently, both by the Government and by the Commissioner, the Lieutenant-Governor cannot but regard Mr. Urquhart’s conduct as wholly inexcusable.”

65. *Task enforced.*—Regarding the means to be adopted to make the labourers turn out a fair amount of work, he wrote :—⁴

“To the distressed poor of both sexes the task-work system” (which term as is shewn by comparison with other passages is here used to mean the same thing as the piece-work system) “cannot be generally applied. As much work must be obtained for them as they can fairly do, and no more. Any stringent enforcement of a labour test may repel these people and cause ultimate danger to life. But it is better to obtain a little, even the smallest amount of work, from those who can work, than to give gratuitous relief. The offering of piece work is very good whenever the people will accept it, the terms offered being, as has been said, liberal.”

66. *Rates relaxed.*—The effect of this attempt to introduce discipline and to obtain a fair return for wages was at first very discouraging. Writing on the 1st May, the Government of India report⁵:—“The local officers received instructions to divide the relief-works into two classes, one for the able-bodied, where real labour by piece-work would be exacted and full wages paid, the other for less effective labour, or easy piece-work, requiring no professional supervision, and remunerated by mere subsistence rates.” On this system being suddenly introduced, about 350,000⁶ labourers left the works in one day. A few came back immediately afterwards: a large number were drafted to village works under the circle officers; many who were not fit for any save nominal work were admitted to the lists of charitable relief. But still Sir R. Temple found⁷ that “numbers, estimated at 80,000 to 100,000, had remained out of employ for

¹ B. B. I, 326.

² Low as they were, they left a margin for charity, since Sir G. Campbell saw two or three Fakirs living on the charity of a relief gang.

³ *Id.* I, 329.

⁴ *Id.* I, 328.

⁵ *Id.* I, 372.

⁶ *Id.* I, 347.

⁷ *Id.* II, 94. (T.)

⁸ *Id.* III, 155.

"several days, subsisting on the little savings from their earnings on the daily wage system, but verging nearer and nearer towards the extremity of destitution." Hence, though the terms proposed had not been really hard, Sir R. Temple immediately offered 'new terms, much more liberal, indeed as liberal as could properly be offered'; and these speedily attracted large numbers back to the works. What the rates of payment were which were offered in the first case and afterwards relaxed is nowhere stated; but in the next fortnightly report (1st to the 4th May) Mr. Metcalfe gives the following description² of the system.

"On every tank labourers have been given distinctly to understand that they were at perfect liberty to work either at task-work or at daily labour. The allowance for daily labour has been so proportioned that it is just sufficient to subsist on with some degree of comfort. On the other hand, the reward for task-work has been extremely liberal: this holds out an inducement to those who are willing to work and able to work, to earn a fair day's pay for a fair day's work. It has always been possible for a man to make his four annas a day at task-work. This, with rice at one kutchha seer for the anna, is very high pay indeed for one who is not a professional coolie. The consequence of this system is that those who are weak and unable to do much work find such light work to do on the tank as they are capable of doing, and for this daily labour obtain enough food to last for the day. On the other hand, all the able-bodied men take piece-work, and are the real effective coolies on the tank."

67. *The piece-work system.*—In the next report³ Sir R. Temple enters fully into the subject of these rates: at this time (the end of May) there were 1,450,000 people on the works, of whom not more than 180,000 were on daily wage, the rest being on piece-work or task-work. The daily wages given are $1\frac{1}{2}$ annas⁴ in Tirlut, and $2\frac{1}{2}$ annas in the eastern districts for men: which is only enough to afford "a meagre and jejune subsistence." On task-work "the wages are kept low, hardly higher than the daily wages above described, and as a day's work is exacted, these people are working for what is a stinted subsistence relatively to the high prices of the day. For the piece-work the rates now allowed do appear more liberal for the skilled and industrious, especially in Eastern Tirlut where the last rate is from 5 to 6 annas⁵ per 100 cubic feet. But they were framed in order to suit those large numbers who, originally of a poor physique, had been recently lowered in condition. The pressure so to speak had to be regulated according to the weakest part of the beam."⁶ "Being anxious, however, that the State charity should be administered with as much thrift as possible," he had authorised the lowering of the rate to 5 annas, and in some cases to $4\frac{1}{2}$ annas, per 100 cubic feet. It was admitted that with these rates the strong and skilled would make more than a subsistence, but this surplus is being saved up against the time between the closing of the works, due to the rains, and the ripening of the crop. "Those who save at the present time will not come on our hands when the works are closed." Some people also⁷ took advantage of these high rates for piece-work to earn enough for their support in a few hours, and to spend the rest of the day working on their fields. This however could not be helped.

"The piece-work system was seen to be open to one particular objection, in that a practised or professional workman earns more than need be allowed to him as relief. Any terms which are favourable enough for the unskilled or inefficient (who are the great majority) must prove too favourable for the skilled few. It was decided that this objection could not be obviated, and that no exception could be made as against those individuals, especially as their example instructed the mass of the relief-labourers in workmanlike habits."

68. *Effect of small local works.*—The spread of local relief-work all over the country had the usual effect of keeping down the numbers employed on the really useful Public Works which Government was anxious to push on.⁸

"The Gunduk embankment indeed, being very favourably situated in respect to distressed tracts, did attract almost as many labourers as could be advantageously entertained—45,000. But the Soane Canal and the Northern Bengal Railway never received the desired complement. The highest numbers of labourers on these works may be thus stated:—

Soane Canal	-	-	-	-	-	41,000
Northern Bengal Railway	-	-	-	-	-	22,000

Unsuccessful attempts were made to induce bodies of labourers from Sarun to resort to the Soane Canal, and from the south of the Ganges, Monghyr, and Sonthalia to the Northern Bengal State Railway. Frequent injunctions were sent to the local authorities to send labourers to that railway, but without

¹ B. B. III, 156.

² *Ib.* III, 164.

³ *Ib.* III, 177.

⁴ The Deputy Collector of Muzaffarpur (Munshi Ishri Pershad) says in his reply to the Famine Commission that on his works in that district two annas were paid to men.

⁵ Mr. Kirkwood (Reply to Famine Commission) says that in the north of Bhagalpur the rate in May was six seers of rice (equal to eight annas) per 100 cubic feet.

⁶ *Ib.* III, 178.

⁷ *Ib.* II, 94. (T.) Some, however, spent their leisure less profitably, doing nothing at home; and they explained to Mr. Oldham (Relief Officer in Champaran) that "they did not care to work every day."

⁸ *Ib.* II, 95. (T.)

much result. These numbers would have been greater had there been no other relief-work. Some men who might have been induced to leave their homes and go to a distance for these great works preferred lesser works close at hand. But this objection cannot be obviated, when, from general famine, it has become necessary to spread a relief system over the country. The majority of relief labourers cannot migrate to a distance for a short time; they have their families, their fields, and their concerns at home, all of which will in a very few weeks urgently need their presence. Their time would be lost in going and coming, and unless they receive bounties (which are otherwise objectionable) they could not subsist. For them, therefore, if no works but the great engineering works are open, there will be no relief at all, and they must perish. But if the numerous lesser works are open for them (and they are the vast majority), it is impossible to prevent the few who could migrate from taking advantage of the works near at home. Nor is this wholly disadvantageous. For these are the very men who, having skill, shew the unskilled multitudes how to work, and thus render the relief labour more productive."

69. *Minor relief-works; the duty of landowners.*—With regard to minor relief-works of local and restricted utility, the following was Sir G. Campbell's opinion¹ at the outset of the famine:—

"There has been much complaint of the want of good tanks for drinking water, of petty drainage channels, and such like improvements. There can be no doubt that petty works of this kind are at least as useful as large works, and they certainly bring employment more effectually to the homes of the people. But, on the other hand, it would be impossible for Government to undertake and superintend such works of local improvement on private property. The Lieutenant-Governor has, however, instructed the Commissioner to ascertain whether it might be arranged that private landholders should undertake such works, Government if necessary advancing the money on the security of the estates. He feels sure that if the upper classes feel the duties of their position such an arrangement should be gladly accepted by them, and be very feasible."

70. *Conditions on which Government may assist them.*—It was soon found, however, that the zemindars would not be willing to pay for such improvements as these, even though the money was lent them, and the next relaxation was to promise² that "Government would be ready to defray a portion, not more than one-third, of the cost of petty village works executed with Government loans before the end of July 1874, which directly improve the drinking-water supply of the people, or are shown to be of direct advantage to the general public." Advances also³ were to be given for digging wells, (1) to zemindars on the security of their estates, (2) to ryots on the security of zemindars, (3) to ryots on their own security, (4) to ryots on no security at all, "provided the need is very urgent, and the ryots from the character and position they hold in the village can be presumed to be men who will honestly repay the money to the best of their ability."

71. *Conditions under which Government may undertake them altogether.*—To some extent these loans and promises of assistance were taken advantage of by zemindars and others, but the question remained whether, failing this, it was right for Government to expend public money on works situated on, and which would more or less improve, permanently settled estates. The Commissioner of Bhagnapur raised this point, on the 18th January⁴ (at a time when in all his Division he had less than 15,000 labourers to employ) by writing "we cannot provide a sufficient number of embanked roads which can usefully be undertaken. There are plenty of excellent and useful tanks, which will do much good and will bring the work near to the homes of the people; but there is little hope of our getting the zemindars to undertake a sufficiency of these works, either from advances or otherwise." On this Sir G. Campbell wrote that though this was the zemindars' duty, and they ought to be persuaded to fulfil it, still there was risk that "while the work of persuasion was going on, the relief-work may fall short, and the people be left without work and without wages." It was possible to pass a law making the zemindar liable for a part of such expenditure, but that would take time. On the whole his view was⁵ that—

"In some cases when proper public works cannot be found, either the Government or the relief committees must undertake works, which are not public works in the ordinary acceptation of the term, in order to give employment to the people and save the cattle. Unless Government is prepared to legislate, we must confine ourselves to those works which seem most beneficial to the people, and make the best bargain we can with the landholders in each case. In such circumstances Government might undertake works of a large and heavy description or very emergently required to save the country, while petty village works necessary for relief might be undertaken by the relief committees."

To this proposal the Government of India assented (9th February).

72. *Conditions further relaxed.*—On the 28th March, Sir G. Campbell, after his visit to Durbhangan, wrote thus⁶ regarding the carrying on of these works—

Para. 19. The village works under circle officers must necessarily be conducted, for the most part, by non-professional people; but I have arranged that in each relief circle an officer should be specially

¹ B. B. I, 6 (Nov. 3rd).

² *Id.* I, 242..

³ *Id.* I, 54 (Nov. 17th).

⁴ *Id.* I, 243.

⁵ *Id.* I, 81 (Nov. 15).

⁶ *Id.* I, 328.

charged to look after the works in the circle. There has been much correspondence regarding these village works. The result is that, by aiding zemindars and otherwise, we must promote the employment of the people to the very utmost, but that in the last resort in very distressed tracts, where the people are likely to starve and no one can be induced to undertake works for his own benefit or from public spirit, the Government must employ the people by undertaking such works (excavating tanks and the like) as are most beneficial to the general community. I rely much on the tact and energy of the local officers to make these arrangements for the best. Even when Government pays for the works, they may advantageously be placed under the village headmen and others locally interested; we want to give the people work near their homes, and, if the headmen are interested, they will carry the work out all the more readily."

These works however were not popular :—

Para. 23.—"In many places the labourers dislike tank work and insist on flocking to the roads. We must reduce them to order and discipline, and make them do the work most fitting for them to do; but still it is a great object to maintain large works sufficient for the employment of all the labourers who legitimately seek work and submit to regular discipline, while at the same time the opportunity of permanently benefiting the country should not be neglected."

73. *Numbers on large and small works.*—The respective numbers employed on large and on small works are not given in all the returns; but the following statistics have been collected regarding them from the fortnightly narratives :—

Periods of time.	Total No. employed.	No. on Village works.
April 17th to 30th - -	1,238,092	616,162
May 1st to 14th - -	1,373,401	699,495
May 29th to June 11th - -	1,737,768	870,846
June 12th to 25th - -	1,770,732	1,010,648
June 26th to July 9th - -	893,163	404,290
July 10th to 23rd - -	686,762	256,374
July 24th to August 6th - -	453,486	214,718
August 7th to 20th - -	426,738	230,167
August 21st to September 3rd - -	395,403	199,170
September 4th to 17th - -	331,982	121,912

In the Patna Division about half to two-thirds of the relief labourers were employed in the village works; in the Rajshahi Division about three-quarters were so employed, in the Bhagalpur Division about half, and in the Bardwan Division a very small proportion.

74. *Total numbers employed monthly.*—The following statement shows as far as it can be ascertained the average monthly numbers employed on relief-works. The appended statement gives the same information in detail for each district¹ :—

November 1873 - - -	5,281
December " - - -	49,051
January 1874 - - -	113,224
February " - - -	284,690
March " - - -	674,074
April " - - -	1,295,816
May " - - -	1,694,142
June ² " - - -	1,198,908
July " - - -	632,259
August " - - -	426,077
September " - - -	242,079
Total - - -	6,615,601

Looking only at the time of greatest pressure, the average number employed daily during the nine months from January to September was 735,067.

¹ The figures for the districts are taken from Mr. MacDonnell's report, those for the three large Public Works Department works from the special narratives: but Mr. MacDonnell's figures are not quite complete, the numbers employed in the Patna District, for instance, not being given.

² The sudden fall in this month is very remarkable, and does not agree with the figures given in the preceding paragraph according to which the numbers went on increasing till June 25th, and only began to fall at the end of the month.

STATEMENT OF THE NUMBER OF PEOPLE RELIEVED ON WORKS IN BENGAL DURING THE FAMINE OF 1873-74.

Districts.	November, 1873.	December.	January, 1874.	February.	March.	April.	May.	June.	July.	August.	September.	Total number relieved.	Average monthly number.	Average cost per head per mensem.	Grain wages.	Cash wages.
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17
Shahabad -	950	2,260	2,227	2,682	3,033	6,290	10,074	6,454	4,407	4,493	2,996	45,792	4,163	Rs. 5 11 10	Tons. 545	Rs. 1,89,373
Sarru -	-	-	20,180	87,181	106,850	166,683	197,342	223,991	140,765	110,262	101,111	1,154,365	128,274	2 10 2	11,487	15,06,412
Darbhanga -	-	-	2,500	45,000	251,402	531,578	569,402	279,943	77,615	66,408	21,682	1,845,530	205,059	2 8 3	10,769	31,88,829
Muzaffarpur -	-	851	973	13,692	64,841	177,238	327,248	269,177	128,778	102,183	39,654	1,124,635	112,463	2 1 10	9,500	11,00,685
Champaran -	561	4,589	11,631	25,361	52,758	63,917	159,668	79,752	73,007	8,938	1,849	502,031	45,639	3 3 10	7,294	6,43,808
Gya -	-	-	142	454	764	1,234	2,486	2,756	1,192	397	363	9,908	1,101	5 11 1	117	40,648
Ilhawalpur -	1,851	4,166	7,485	3,639	7,956	22,234	32,637	27,528	29,556	29,424	12,002	177,978	16,180	2 2 6	1,474	1,85,498
Monghyr -	-	4,210	5,227	4,240	4,460	4,631	10,596	11,148	3,912	1,972	332	50,728	5,073	3 14 7	486	1,32,993
Southal Pargannas -	-	-	400	540	2,375	12,490	24,383	27,039	18,236	11,811	6,130	103,534	11,510	4 4 10	1,970	1,79,959
Purneah -	-	356	945	3,640	10,231	20,264	31,029	28,763	21,746	9,626	1,014	127,614	12,761	7 6 1	5,366	2,17,584
Dinapore -	1,800	6,055	21,179	29,696	60,616	30,208	94,797	53,259	25,742	8,653	2,543	397,448	36,132	3 14 8	2,934	11,61,492
Rangpur -	-	59	722	1,705	3,988	31,696	53,308	22,747	5,830	93	7	125,155	12,515	4 9 6	922	4,50,909
Muldah -	-	426	260	1,816	3,366	5,154	7,374	5,442	3,650	2,441	762	30,691	3,069	4 8 9	243	1,06,762
Murshidabad -	-	737	1,892	2,898	2,834	3,134	3,103	3,347	2,765	6,171	1,967	28,288	2,829	5 14 0	707	70,795
Rajshahi -	619	713	557	451	3,316	2,971	2,162	1,914	979	878	395	14,555	1,555	5 5 8	209	51,841
Bogra -	-	45	587	1,566	8,000	29,285	45,454	17,521	8,000	-	-	110,518	12,815	3 9 5	813	2,58,111
Pabna -	-	111	229	621	1,636	863	2,558	2,214	1,118	252	40	9,681	968	3 11 5	100	22,456
Birbhum -	-	-	-	652	2,107	3,846	8,054	10,352	6,655	7,826	5,194	44,686	6,586	4 7 8	1,004	64,809
Bankura -	-	-	-	-	2,391	1,890	2,639	3,492	3,651	4,103	3,302	21,368	3,053	9 9 0	797	96,850
Bardwan -	-	-	1,168	3,513	3,369	6,430	9,613	11,574	7,571	5,252	2,206	50,686	5,632	5 3 4	1,495	62,277
Nautilya -	-	-	-	1,662	2,409	1,850	2,348	4,054	5,006	4,848	2,037	24,214	3,027	8 0 11	478	1,30,712
Maunbhum -	-	-	-	1,371	3,215	10,092	13,917	14,269	8,211	794	127	51,896	6,487	6 1 6	1,691	88,122
Total -	6,281	24,604	78,304	231,720	606,906	1,216,988	1,610,332	1,106,726	578,442	386,825	205,733	6,061,861	635,695	2 16 10	60,401	99,50,925
Soune Canal -	-	1 28,475	32,000	94,000	30,439	36,558	41,019	33,397	27,441	26,472	2 26,020	310,621	31,062	-	-	-
Gandak -	-	1 972	1,620	14,370	27,224	27,024	23,964	36,410	15,450	7,386	2 5,942	169,362	16,036	-	-	-
Northern Bengal Railway -	-	-	1,800	4,600	9,505	15,446	18,827	22,375	10,926	5,394	2 4,384	92,757	10,306	-	-	-
Total -	-	1 24,447	34,920	62,970	67,168	78,828	83,810	92,182	63,817	39,252	2 36,346	563,740	57,404	-	-	-
Grand Total	5,281	49,051	113,224	284,690	674,074	1,295,816	1,694,142	1,198,908	632,269	426,077	242,079	6,615,601	693,999	-	60,401	1,28,40,000

1 From 13th December only.

2 Nitrat fortnight only; all strictly relief-works closed.

75. *Cost of relief-works.*—Up to the middle of April the labourers were generally paid in cash, and 31 lakhs of rupees were disbursed in wages¹ before the 15th of that month. After that date the system of paying in grain was introduced, either by issuing food grain, or establishing a shop close to the works and paying the labourers in money, and leaving them to buy grain at the shop or at the nearest Government granary. The total cost was reckoned by Sir R. Temple as Rs. 1,28,40,000 in cash and Rs. 46,90,000 in grain; but this sum apparently is got by taking the ton of grain as worth about Rs. 75. Taking it at Rs. 135, the cost of the 60,401 tons disbursed as wages (see column 16 of preceding statement) in certain districts alone was Rs. 81,54,000. There was besides the value of the grain disbursed on the great Public Works, which is not recorded. Putting this aside, the total cost of relief-works was Rs. 2,10,00,000, and the average payment per head per month Rs. 2-15-10, or say Rs. 3. But in several districts it exceeded Rs. 5, and in Purnea it was as high as Rs. 7-6 per head. Of the expenditure, 37 per cent., or about Rs. 77,00,000, was expended on tanks, and 63 per cent., or Rs. 1,33,00,000, on roads of which the value (at the labour rates of ordinary years) was estimated as Rs. 55,00,000.

76. *Result of works carried out.*—The result² of the relief-works was that in the country north of the Ganges about 4,000 miles of old and new roads had been set in order or made, and besides these about 2,600 miles of road had been made or repaired in the Bhagalpur, Rajshahhai, and Bardwan Divisions, making 6,600 miles altogether. It was estimated that an expenditure of about 14 lakhs more was required to bridge these roads, and put them in working order.

PRINCIPLES OF ADMINISTERING GRATUITOUS RELIEF.

77. *Earliest views as to tests.*—The earliest views expressed on the subject of administering gratuitous relief were in accordance with those which had been followed in previous famines. In his letter of January 10th,³ instructing district officers that the time had come to make definite arrangements for the constitution of Relief Committees and for setting them to work, Sir G. Campbell said: "Everywhere care will be taken that relief is not given without work, when work is possible, being exacted as a test of necessity; but it must at the same time be remembered that there are classes of men, women, and children who cannot work on the roads; many of them too are in remote villages and out-of-the-way places; they will sometimes die without complaint rather than come to relief-houses and make their wants known." The members of Committees must be trusted to find out these people, "to judge of their real wants and reasonable prejudices, and to do what is possible to combine economy of means with efficient relief."

78. *Duties of the Relief Committee.*—On the 13th February, the Government of India declared its views⁴ as to the field which the Central Relief Committee ought to occupy, and the manner in which gratuitous relief should be administered. "The whole force of the administrative machinery of Government must be directed to the transport and distribution of food. The responsibility of ensuring a supply of food to those who cannot obtain it by other means must rest with the Commissioner of the division and the local officers." The functions of the Central Committee, as far as regarded such tracts as North Behar, should be "confined therefore to collecting subscriptions, and arranging for the supply of money or food to the District committees," to which the management of all details should be left, the Central Committee interfering as little as possible; they would of course not purchase grain except from the Government stores.

79. *Abolition of tests.*—The Viceroy then went on, in a most important passage, to declare the views of the Supreme Government as to the distribution of gratuitous relief, the abolition of any system of tests, and the preferability of placing reliance on the personal local knowledge of the distributor.

PARA. 7.—"Where distress arises from a general deficiency of the food-supply of a large area of country, which deficiency cannot be met by private traders, stringent labour tests are not applicable. The labour test was tried during the earlier portion of the Irish famine; it failed, and ultimately gratuitous distribution of cooked food was substituted. It was under the latter system, coupled with the sale of grain at market rates by Government where private traders could not supply it, that the Irish famine was at last successfully dealt with. The circumstances in India are not entirely similar, but it appears to His Excellency that where they differ, the difference would point to an extension of the system of gratuitous distribution of food, and especially to the establishment of a system of advancing

¹ B. B. II, 84. (T.)

² *Id.* II, 105. (T.)

³ *Id.* I, 171.

⁴ *Id.* I, 289.

supplies of food to cultivators. When distress extends to whole classes of the population, His Excellency relies upon the local knowledge of the persons entrusted with the distribution of relief to prevent abuses.

PARA. 8.—“This subject is one of great importance. The provision of employment for the labouring population upon public works was directed, and in His Excellency's opinion properly directed, at the outset of the period of scarcity as a preliminary and precautionary measure, so that the means of providing themselves with subsistence might be afforded to the labouring population, and to the smaller cultivators who were not altogether unaccustomed to labour for hire. This application of public works has been proved to be sound by the experience of former periods of scarcity in India, but any system of relief by public works becomes impracticable when applied to a very large proportion of the population of a country. In order to apply it under those circumstances, unprofitable work must be found simply as a test by which to prove that the persons applying for relief are proper objects upon which to bestow it. Any application of such a test upon the scale that would be necessary in dealing with North Tihoot would in His Excellency's opinion inevitably break down, and, moreover, by congregating cultivators at centres for the purpose of giving them employment entail not only considerable hardships upon the people, but, as was found to be the case in Orissa, more serious evils.

PARA. 9.—“These observations are by no means intended to imply that wherever useful work can be found, whether of a public or of a private character, advantage should not be taken of it as affording a most valuable aid to the general system of relief, but they have been made for the purpose of preventing the relief committees from considering the universal application of a rigid labour test to be recommended by Government.”

80. *Rules for Relief Committees.*—The rules for the guidance of the sub-divisional and sub-committees were originally issued on the 26th January, but were afterwards slightly amended, and stand thus¹ in their final form :—

Their principal functions were to be :—

- (a) To collect subscriptions, and to distribute the resources which will be at their disposal from local subscriptions, from the contributions of Government, and from the grant received from district committees.
- (b) To distribute for relief purposes grain received from local sources or Government depôts.
- (c) To transport grain to convenient places, and to provide for its proper storage.
- (d) To distribute gratuitous relief to persons in need of it and unable to work.
- (e) To provide useful employment for those people who are in need, and are able to work, by instituting minor relief-works, and providing other employment, such as spinning, weaving, husking rice, &c. Sub-divisional committees will have information of the Government public works in their neighbourhood in order that labourers may be despatched to those works, together with their families if desirable.
- (f) To provide in such manner as may be considered the best, in each particular locality, for the relief of persons whose caste, usages, and feelings preclude the application of a labour test—women of good family and others who may be in great distress. Relief for this class of persons may be afforded either wholly gratuitously or partly gratuitously, by the sale of grain under the market rates, or, with due precautions, by the advance of money or grain to be subsequently repaid.
- (g) If a serious deficiency of grain in any part of their district is apprehended, which the trade is unable to supply, the sub-divisional committee may, under instructions from the collector of the district, make arrangements for the sale of grain from Government stores. The arrangement should, as a rule, be made through the agency of the traders, which will probably be available everywhere. The selling price should be fixed at that of the nearest large mart, where supplies are readily brought in by railroad or river, together with such addition representing the cost of transport as may be considered proper. Sales should be stopped as soon as the trade receives sufficient supplies, and any competition with the local trade should be carefully avoided. This rule will not interfere with the sale of rice under the market rate as a means of relief under clause (f) to persons whose cases have been inquired into by the committees or their officers.
- (h) The congregation of large masses of people away from their homes for the purpose of relief should be avoided. Every village in which general distress exists should, so far as practicable, be dealt with separately as regards relief-works and the distribution of gratuitous relief. The acceptance of cooked food should not be insisted upon as an invariable test to be applied to all who require relief. In the very distressed districts such a test would generally be inapplicable. It may be necessary to establish poor-houses in some places, such as considerable towns. In those houses food might be distributed, cooked or uncooked, as may be most convenient. Generally speaking, those who are unable from illness to cook their own food should be provided for in hospitals.

81. *Sir G. Campbell advocates the test of cooked food.*—On the 16th February² Sir G. Campbell wrote the following passage in reference to paragraph 7 of the Viceroy's minute quoted above, to explain what in his view was the province within which tests were useful and applicable. He considered that a note he had written had been misunderstood by the Viceroy :—

“He there intentionally used the expression ‘test’ and not ‘labour test,’ for he has never over-estimated labour tests alone. As a member of the Orissa Famine Commission, and elsewhere, he has, on previous occasions, pointed out how ineffective such tests become when famine has gone beyond a certain point and labour becomes nominal; and while seeking to utilise labour to the utmost, he has never insisted on its usefulness beyond a certain point.”

¹ B. B. I., 289, 290.

² *Ib.* I., 27+.

PARA. 3.—"At the last conference at Government House, the Lieutenant-Governor submitted to His Excellency the Viceroy, as a question for discussion and instruction, the question now under consideration, as follows:—

"V.—When the numbers to be relieved get beyond ordinary poor-houses and careful individual village relief, is it desirable to insist on labour on Government works in return for full rations or strict poor-house test? or is it better to give up the attempt to exact labour, and simply to give to all who seem to be poor a minimum of the poorest sustenance—gruel cooked by the Brahman according to Sir George Balfour's recipe?"

On the same day he issued a circular forwarding the Government of India's letter of February 13th quoted above, and saying¹—

"As regards paragraphs 7, 8, and 9, it will be understood that it is by no means intended to discourage the system of relief-works which has been hitherto enjoined, or the employment of both the inmates of poor-houses and those receiving outdoor relief in various ways, as contemplated by the instructions. So long as famine does not reach an extreme point the relief-works and other employments will both utilise the available labour, act as a test of real need, and keep the people receiving relief engaged in manner conducive to their well-being. It is only when want becomes so general that it is impossible to employ a whole population, or to obtain any real or adequate work from great numbers employed on nominal work which they do not do, that the instructions of the Government of India become applicable. If such a state of things should unhappily come about the Committee's instruction that gratuitous relief must be given to those for whom work cannot be found will come into play. In that case it may be necessary to give food to all the needy, and the test on which we must chiefly rely must be that on which the Committee has insisted, viz., that, as a rule, the gratuitous relief so given must be in the shape of cooked food. In this country the great mass of the people are little inclined to accept charity in this form, and this alone will be in their case a sufficient test of their needs. It would be impossible to dispense with this test, because if uncooked grain were distributed gratuitously to all we should certainly be called on to support the whole population—a task beyond the means of Government—unless it be under extremely exceptional circumstances in limited tracts. The Committee's rules amply provide for searching out and relieving those who have good social or other grounds for objecting to the form of relief by cooked food, and are yet so poor and helpless as to require gratuitous relief, which in such cases is to be given by assignments of uncooked food."

PARA. 4.—"Again, if famine does not reach the extremest degree of severity, or as soon as it begins in some degree to abate, it is of very great importance that no portion of the population hitherto self-reliant should be allowed to sink into confirmed paupers, and the utmost vigilance must be used to wean such people from dependence on charity, and restore them to self-support. For this purpose, both as a test and as a step towards return to habits of self-reliance, the exaction of labour will be most beneficial, and should in no degree be neglected."

82. *Duties left to Central Relief Committee.*—On the 21st February some instructions were examined which the Central Committee proposed to issue to the Subordinate Relief Committees, and which it was thought might conflict with the orders issued by Government, and place the local officers in a difficult position under two masters. It was decided by Lord Northbrook² that in the very distressed districts (these were declared to be seven in number—Tirhut, Champaran, Saran, Bhagalpur, Purneah, Dinajpur, and Maldah) it was better that Government should take the whole cost of ordinary relief, including the gratuitous distribution of food, into its hands, making no charge against the charitable funds, and in those districts the functions left to the Central Committee were only two—to provide useful employments, such as spinning, weaving, &c., or allowances of money and clothes, for those who neither went to the Government relief-works nor received the Government grain. In other parts they were to carry out the functions entrusted to them by the rules, to pay for the Government grain they distributed at a rate less by 10 per cent. than the wholesale rate ruling in the nearest large mart where there were ample supplies (e.g., for the Patna Division the Patna rates were to rule the price to be paid³), and to employ, appoint, and pay for the relief agency. But on further consideration, even this position was seen to have its inconveniences: the distinction between very distressed and distressed districts was withdrawn,⁴ and it was decided that the Local Relief Committees should be entirely under the orders of the district and sub-divisional officers, and should receive no instructions at all from the Central Committee, whose functions were restricted to the collection and distribution of funds and the receipt of reports.

83. *The test of cooked food repudiated.*—Sir G. Campbell's views about tests, and especially about cooked food, were however too stringent, in the Viceroy's opinion: and on the 6th March, while republishing the amended rules for Relief Committees, he wrote as follows:—⁵

"The Government has not prescribed the invariable use of any test either by labour or by the distribution of cooked food, for the purpose of determining who are fit objects for relief. Such tests are desirable and necessary under certain circumstances. It is right that able-bodied men, accustomed to labour, should, as a general rule, be required to work in return for the food and money supplied to them. It is desirable that light work should be found for others where this can be arranged profitably, and without obliging large numbers of people to leave their homes. In dealing with certain classes of

¹ B. B. I., 275.

² Ib. I., 286-7.

³ Ib. I., 281.

Ib. I., 290.

⁵ Ib. I., 292-3.

distress, especially in towns, the issue of relief cooked food may be useful as a test. But stringent tests are inapplicable to those limited tracts of country where, owing to the great failure of the crops and the absence of private trade, the Government have, in accordance with their Resolution of the 7th November last, assumed the task of importing grain for sale and distribution to the people.

"In such tracts the difficulty will be not to prevent undeserving applicants from being relieved, but to ensure that sufficient supplies reach those who require them; and, in addition to the modes of relief and the provision for the sale of grain specified in the instructions to Relief Committees, grain should be freely advanced to zemindars and mahajans under the instructions already issued by the Government of Bengal, as well as to the cultivating ryot, where there is a reasonable probability of repayment, at the discretion of the local officers, and with due regard to the maintenance of a sufficient reserve."

On receipt of this,¹ Sir G. Campbell cancelled so much of his circular of February 16th as referred to the application of the test of cooked food.

84. *Objections to cooked food.*—After his visit to North Behar, Sir G. Campbell wrote as follows,² regarding the administration of relief, when the test of cooked food was not applied:—

"The only form of gratuitous relief which can be given somewhat indiscriminately, without leading to great abuse and future difficulty, is cooked food. It is clear that the people of Behar will not accept this form of relief in any numbers till they are very much straitened. It is not that the lower orders have much caste—many of them will eat almost anything; but they are enviously timid, afraid that we may ship them off beyond seas and what not, and very averse to altering their habits."

85. *Gratuitous relief given in raw grain.*—In the middle of April³ it was decided that gratuitous relief should be, for the most part, given in grain.

"The issue of rations in grain to the recipient of charitable relief was arranged without difficulty. The grain consisted generally of rice. It was necessary that, together with the rice, some other kind of grain, or some vegetable and condiment, should be taken. To enable these people to purchase the necessaries, a small portion, one-sixth, of the ration was given in money. It was not found expedient as a rule to issue cooked food or prepared food, save in a few places. * * * Registers had been prepared of all fit recipients of this relief. The tickets entitling the people named to gratuitous relief had been issued to each person or to each family. Those who were able to do any, even the lightest kind of work—weaving, spinning, or the like—had their tasks allotted. Those who were unable to take any care of themselves were lodged in poor-houses, or placed under medical supervision. There was still, however, some difficulty in searching out all the fit objects of this relief. The superior officers of the circles, on going their rounds in the villages to see whether the registration had been completely done, would find here and there some feeble person not included in the registers. And at each weekly or bi-weekly inspection by the group or sub-circle officials the nominal roll was swelling. In justice to the people it must be said that but little imposture came to light; we had to guard rather against their holding back unduly than against their coming forward improperly. Whether from shyness, or ignorance, resignation, or despair, they often faced mortal danger in a manner which inspired both pity and esteem.

"By degrees those persons who, from caste, delicate nurture, social seclusion, or such like reasons, could neither work nor beg, were added more and more to these lists. In North Behar, the Tirhootia Brahmins form a very numerous class. Some few of them were induced to work for Government wages, by the persuasion of a relief officer who was himself a Brahmin. It is probable that the majority of them would, sooner than work, have drifted into a condition near to starvation. The local authorities deferred relieving these cases as long as possible, but gradually admitted them according as the imperative demands of safety might dictate. The people of this class, however, were, from a natural pride, often unwilling to be regarded as recipients of altogether gratuitous relief, and would endeavour to pay something, however small.

"In the Burdwan Division only was there any reason to take precautions against imposture. There the endemic fever had necessitated the administration of relief, medical or other, during several years past, and some classes had gradually fallen into habits of undue dependence on public charity. Here the issue of cooked food served as an effective check in this division."

86. *Statistics of gratuitous relief.*—The total quantity of grain distributed gratuitously is nowhere stated in Sir R. Temple's closing minute: it can, however, be arrived at in the following manner:—

Total quantity of grain disposed of	-	-	-	Tons.	343,000
Deduct—					
Sold to public	-	-	-	Tons.	118,107
Advanced in loans	-	-	-	-	107,877
Given as wages to labourers	-	-	-	-	60,401
Total	-	-	-	-	286,385
Balance available for gratuitous distribution	-	-	-	-	56,615

¹ B. B. I, 291.

² *Id.* I, 330.

³ *Id.* II, 93. (T.)

This agrees fairly well with Mr. MacDonnell's figures, according to which the quantity distributed was 50,058 tons. The cash distributed¹ was Rs. 25,54,000; so that the total cost of gratuitous relief (taking the grain at Rs. 135 per ton) was Rs. 93,12,000. The average number daily relieved during each month in each famine district is shown in the detailed statement which follows (compiled from Mr. MacDonnell's report) of which this is an abstract :—

	No.
January - - - - -	378
February - - - - -	3,708
March - - - - -	24,003
April - - - - -	168,245
May - - - - -	305,052
June - - - - -	508,770
July - - - - -	685,595
August - - - - -	582,361
September - - - - -	318,161
October - - - - -	23,272
November - - - - -	4,118
Total - - - - -	<u>2,623,663</u>

¹ The total cost of charitable relief, according to Sir R. Temple's final Minute, was Rs. 28,00,000. The difference may be due to the cost of establishments and miscellaneous charges.

STATEMENT showing the number of People relieved in BENGAL gratuitously during the FAMINE of 1873-74.

Districts.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	Total Number Relieved.	Average Monthly Number.	Average cost per head per mensem.	Grain distributed in Charitable Relief.	Cash distributed in Charitable Relief.
Shahabad, p. 23	—	—	187	1,387	2,906	935	2,762	2,747	1,501	—	—	12,515	1,788	Rs. 5 12 5	Tons. 287	Rs. 33,566
Suran (45)	—	—	824	2,590	5,801	4,842	7,450	9,404	3,603	—	—	35,514	5,073	10 8 11	610	2,02,663
Darbhanga	—	—	—	82,642	130,178	160,250	187,129	173,518	72,654	—	—	815,371	135,895	2 9 5	14,351	1,73,250
Muzaffarpur	—	—	5,550	9,921	16,818	60,655	43,774	39,404	13,407	—	—	189,529	27,075	3 3 3	3,448	1,41,711
Chunargarh	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1,190	56,950
Gya	—	162	268	407	533	1,397	1,813	1,920	1,158	—	—	7,628	953	5 6 6	220	11,522
Blugulpur	—	—	1,486	1,354	12,522	47,580	37,217	37,730	49,382	—	—	187,271	26,753	3 11 9	4,232	1,28,064
Monghyr	70	960	2,630	4,125	3,300	4,284	4,212	3,637	1,902	—	—	24,310	2,701	5 7 2	360	83,865
Saonthal Parganas	—	—	—	—	58	1,007	2,072	3,438	2,395	—	—	8,970	1,794	1 13 6	121	224
Purneah	—	—	707	3,844	8,233	16,538	36,180	33,331	3,372	—	—	102,495	14,642	4 5 11	1,897	1,92,000
Dinajpur	—	—	—	9,926	19,500	40,921	83,410	44,363	21,668	—	—	219,788	36,631	2 1 0	2,732	87,633
Rangpur	308	3,303	6,796	16,805	23,600	34,457	24,093	8,150	—	—	—	116,512	14,564	3 1 4	1,517	1,54,975
Maldah	—	283	482	2,209	8,142	11,107	11,853	8,102	3,905	—	—	46,083	5,760	4 6 11	1,315	26,951
Murshidabad	—	—	373	1,700	2,695	7,860	16,159	21,592	11,962	—	—	62,341	8,906	9 8 7	2,642	2,38,000
Rajshahi	—	—	141	2,880	9,050	18,224	46,564	45,283	10,896	—	—	133,038	19,005	2 7 5	2,080	46,998
Bogra	—	—	621	4,100	25,775	19,534	36,250	—	—	—	—	86,280	17,256	4 10 3	2,549	56,440
Jalpaiguri	—	—	—	290	276	6,225	8,945	6,525	5,284	—	—	27,546	4,591	0 12 6	70	12,211
Birbhum	—	—	504	2,698	7,638	14,463	22,435	34,858	30,213	—	—	112,809	16,116	2 8 0	1,725	49,456
Bankura	—	—	960	5,182	9,520	19,540	38,148	25,223	11,306	—	—	109,879	16,697	2 1 2	930	1,02,659
Haldwari	—	—	2,414	11,997	11,145	19,090	56,989	65,373	64,098	23,272	4,118	268,496	23,722	5 10 9	6,812	5,46,723
Nadiya	—	—	—	—	—	—	—	—	—	—	—	—	—	—	204	54,000
Manbhum	—	—	—	3,188	7,272	10,861	18,140	17,762	10,065	—	—	67,288	11,215	2 10 10	706	84,867
Total	378	3,708	24,003	168,245	305,052	508,770	685,595	682,361	318,151	23,272	4,118	2,623,663	395,137	3 6 11	50,058	26,54,718

The numbers relieved, however, in Champáran and Nadiya are not known, though the amount spent on them is: assuming that the sum expended fed as many people here as in the average of all other districts, 90,000 people must be added to the total number, raising the figure to 2,713,663.

Looking only at the six months, April to September, during which this relief was mainly given, the average number relieved daily was 452,277, and the average cost per head per mensem was Rs. 3-6-11.

87. *Operations of the Central Relief Committee.*—Of the operations of the Central Relief Committee very little is on record. They received altogether¹ from the public Rs. 28,26,690 (of which Rs. 14,65,000 were contributed in Great Britain), and an equal sum from Government: and they expended altogether Rs. 42,90,000, of which Rs. 27,00,000 was paid on account of grain received from the Government stores. Details of the rest of the expenditure are not given.

ADVANCES TO RYOTS FOR SUBSISTENCE.

88. *Early views on the subject.*—The first form which this mode of relief took was the suggestion by Lord Northbrook,² December 16th, that zemindars would no doubt be glad to support their ryots, and to receive advances from Government for this purpose: but that if they did not show alacrity in doing this, and if it was difficult for cultivators to give security, some legislative enactment might be passed to the effect that their landlord shall stand security for the repayment. On the 3rd February³ the Lieutenant-Governor ruled that it was impossible to wait for legislation at such a time: advances might be given, not to zemindars only, but to inferior and intermediate holders, for the use of their ryots, and that when they would not take them, money might be advanced direct to the cultivators as a loan by the Relief Committees under their rules.

89. *Enlarged application of those views.*—A few days later (February 16th), Sir George Campbell wrote again⁴ that the reports he had received convinced him that in many "Districts, perhaps the most pressing want, and even in the most distressed Districts" "one of the greatest wants, is for advances to tolerably reliable ryots who only want a "little help to tide them over the worst time." Every effort was to be made to urge and encourage the zemindars and holders of landed interests to "sustain their ryots" by advances of grain or money; and special report should be made of those estates in which the zemindars could not or would not do this, and Government would be forced to intervene. The effect of this liberality was what might have been expected. Mr. Hudson reported:—⁵

"It is evident that a rumour has spread abroad that there is a distribution of money on the part of Government; and there is a rush from all quarters to get a share of it without any general understanding on the part of the applicants of the objects of the distribution, and without (in many cases) any necessity for it, or any clearly defined object of their own in seeking it."

District officers were besieged by petitions for loans from small cultivators who each offered to pledge his fields or trees or some such property he claimed a right in: but the zemindars invariably denied the existence of any such right, enquiry at such a time into such a number of cases was impossible, and when it was made it often turned out that the rights claimed were imaginary, or that the applicant was not at all in distressed circumstances. Petty traders also applied largely for advances to enable them to import grain.⁶

"These applicants, before they had learnt the catch-word (so to speak), frequently admitted that their object was to buy up grain in their own immediate neighbourhood, and to sell it again; but when my questions had instructed them a little, they of course professed an intention of importing grain from the great Government depôts—Revelgunge, &c. It is clear that, while this endeavour on the part of decayed tradesmen to obtain a fresh capital was a gross attempt to pervert the benevolence of Government into a means of private gain, to scatter abroad small sums to be employed in the manner first disclosed would only be to raise the price of grain by creating a competition amongst petty dealers to obtain possession of it."

Other ryots again applied for grain advances on the plea that their money-lender had refused to grant them any further supplies, and on enquiry it was found that he had done this for the excellent reason that they had owed him money for long and had paid him nothing during the two preceding good years. Sir George Campbell recognised⁶

¹ B. R. II, 80, 81.(T.)

² *Ib.* I, 98.

³ *Ib.* I, 221.

⁴ *Ib.* I, 276.

⁵ *Ib.* I, 298.

⁶ *Ib.* I, 302.

"the dilemma in which we are placed, namely, on the one hand, the difficulty of affording any really wide and adequate relief, if we insist on sufficient security; and on the other, the way in which the liberality of Government may be and will be abused if we adopt a lax and easy procedure." He could only say that "when it is necessary to save life or to keep the people from sinking into pauperism, the Collector must obtain the best security he can, and advance money to ryots if he considers there is a reasonable certainty of repayment."

90. *Advances given still more liberally.*—After his visit to Darbhanga, Sir G. Campbell was inclined to accept a suggestion that when a ryot by labouring on the relief-works has shown his necessity, wages should be advanced to him for the time he must be absent carrying on his cultivation.

PARA. 42. * * * "If the individualising system is carried out fully, and if we know who our labourers are, where they reside, and where they work, we may be able to say to a poor man when the rains commence—we now know that you are no impostor, but a person willing to work for your bread; we cannot employ you longer; it would ruin the country if we could; here is a couple of months' supply of food; we give you that, take it home, but now you must support yourself; we have done with you. Seeing the amount of grain we are storing, and the scale on which our establishments are now being formed, I think this might be done in some parts of the country." * * *

But in North Behar there was a large class of high caste ryots too proud to work and too poor to carry on efficiently the work of another season without assistance. To give money, nominally as a loan, but really with no hope of ever recovering it, would be demoralizing in the extreme; and the business of opening a great system of direct advances to a vast number of ryots would overwhelm the officers. He therefore strongly urged that advances should be given through zemindars and money-lenders; the main security offered by most borrowers was their silver ornaments; but Government could not open a pawnbroker's shop, while the money-lenders could. Villages should be divided into three classes; those in which the zemindar can assist his ryots, and should by every means be induced to do so; those in which he has not the means but has the will, if he gets advances, to the proper use of which our officers must see; and, thirdly, those in which it is found impossible to work through the zemindars, and Government must undertake the task of saving the people alive. But even here it would be better to make use of the money-lenders to whom the villagers are accustomed to look, and to lend money through him rather than directly. The terms of these advances were that half was to be repaid in March 1875, and the rest in March 1876, the price being fixed at 15 seers per rupee at first, and afterwards lowered to 18 seers per rupee. At the prices of ordinary years a ryot would have to sell two maunds of grain to repay the price of one maund advanced in 1874, thus the cost to him would be cent. per cent., and yet there would be no gain to Government but a loss equal in amount to his loss, as the grain cost Government $8\frac{1}{2}$ seers per rupee.

91. *Results of the advances.*—On the 7th November 1874 the Government of Bengal reported¹ that—

"The advances of grain made to zemindars and ryots under the principle originated in the above-mentioned letter have now amounted to over 29,24,000 maunds (108,000 tons), valued at close upon £700,000. The Lieutenant-Governor believes that these advances have been of the greatest possible benefit to the afflicted districts, for by them nearly half a million families have been supported or helped over the rainy months, while small occupiers of land have been enabled to hire field labourers, and so to secure a crop this season on lands which would not otherwise have been cultivated for want of labour."

92. *Measures for their recovery.*—The question now was how to recover these advances. "The great majority of ryots who took them are ready and willing to repay them by the instalments fixed by Government. But among so great a body of men, there must be some individual recusants who will evade repayment if possible, and the advances were in many districts made with a degree of expedition which may have precluded the fulfilment of all the useful legal formalities." In fact, the bonds were in most cases neither stamped nor registered, and even if they were made legally valid, to sue a reculant ryot in the Civil Court would cause great delay and would ruin him with costs: the amount advanced to each ryot averaged from four to eight maunds of grain (worth from 10 to 20 rupees), and the costs would be out of proportion to the value in suits for instalments of petty sums like these. Accordingly, it was proposed that a law should be passed to make these advances recoverable as an "arrear of demand," a procedure which, though summary, was neither harsh nor expensive, and to this the Government of India agreed.

¹ B. B. I, 336.

² *Id.* II, 96. (T.)
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³ *Id.* II, 56.

93. *Amount advanced.*—The quantities of grain advanced to cultivators were as follows:—

	Tons.
Up to the 10th June	14,412
„ 10th July	45,376
„ 10th August	82,935
„ 10th September	102,828
„ 10th October	107,877

It is believed that the recipients of this grain were about 400,000 people.

94. *Value advanced and recovered.*—The value of 108,000 tons of grain at 18 seers per rupee amounts to Rs. 67,20,000. In Sir R. Temple's final minute² it is estimated that Rs. 62,50,000 are likely to be recovered; and from a subsequent passage it appears that this was based on an estimate that 85 per cent. of the value of the grain would be repaid: the value must therefore have been estimated at Rs. 73,50,000. Besides the grain, Rs. 46,00,000 in cash were advanced to planters, zemindars, traders, &c., and this, was expected, would be repaid in full, making a total recovery of Rs. 1,08,50,000. A return prepared by the Government of Bengal for the use of the Famine Commission in February 1879 shows somewhat different figures:—

	Rs.
Advanced in cash	35,86,300
„ grain (value)	69,68,440
Total	1,05,54,740

Of this up to July 1877—

	Rs.	Rs.
Recovered { Cash	29,77,261	
Value of grain	59,20,327	
Total		88,97,588
Written off as { Cash	1,43,175	
irrecoverable { Value of grain	4,892	
Total		1,48,067
Balance ³ { Cash	5,54,828	
Value of grain	9,54,258	
Total		15,09,086

Out of which about three lakhs have been since collected, and twelve lakhs are still outstanding. If the whole of this sum is paid in, the amount recovered will fall very little below Sir R. Temple's estimate.

95. *General Considerations on the Subject.*—On the whole, considering the hurry and confusion of the time, the impossibility of investigating the security offered by the applicants and even the fact of their necessity, and the profuse way in which advances were given, or, according to some accounts, forced⁴ on the people, it must be admitted that the extent to which they have been repaid is creditable to the honesty and self-respect of the ryots. But this should not blind us to the danger of the precedent, or to the cost at which this relief was given. The grain advanced cost the Government

¹ B. B. II, 107. (T.)

² *Id.* II, 110.

³ The Districts where the heaviest balances remain are—

	Rs.
Muzaffarpur	4,04,861
Darbhanga	1,76,905
Saran	1,34,758
Monghyr	1,78,411
Santhal Parganas	1,03,794
Manbhum	1,57,898

⁴ See Reply to Famine Commission by Mr. Hodgkinson, Collector of Saran. "Not only was the power of trade greatly neutralised, but the people became demoralized and reckless, seeing the extraordinary exertions of Government to get rid apparently of as much grain as possible, by some means or other. Besides the inducement to take advances held out by fixing low prices on the grain, the people were practically led to believe it was almost their duty to take advances, and . . . that a paternal Government would never demand repayment. The bitterness of feeling aroused by the realisation of these advances may be inferred from my predecessor's remark in his annual report for 1876-77, viz., that they would sooner die of famine than be again induced to take advances from Government." Mr. Kirkwood, too, (Bhagalpur) thinks (though approving the system generally) that it was overdone, and "many persons thus supported themselves in semi-idleness who should have been labouring on the roads."

Rs. 1,45,40,000, and out of this about Rs. 61,00,000 have been recovered, making a loss to Government of Rs. 84,00,000; it cost therefore Rs. 21 per head to relieve 400,000 cultivators. If they, including their families, were all in grievous want, or in danger of starvation, and if they received relief in no other form, this would be no excessive expenditure; but it is clear from the reports that many of them received relief in other forms also, and that the theory of personal knowledge taking the place of any test, to some extent broke down. The cultivators in their turn had to pay a severe penalty for their readiness to apply for advances; if they were forced to sell grain at thirty seers to repay what they had borrowed at eighteen seers, they have sold 165,000 tons in order to repay the loan of 95,000 tons. The danger of offering to an improvident people too tempting opportunities for getting advances which they will have to repay at a great sacrifice, is one that should be seriously thought of on any recurrence of similar circumstances.

MISCELLANEOUS.

96. *Emigration*.—In the Resolution of November 7th, 1873, the Viceroy expressed a hope that labourers might be induced to emigrate to such places as the tea districts of Assam and to British Burma. For the cost of the Burmese experiment 50,000% was set aside, and a special officer, acquainted with emigration affairs, appointed to superintend the arrangements; but the outcome of all the efforts made in this direction was lamentably small. Up to the end of December 1874, 5,526 emigrants were sent off at a cost of about Rs. 19¹ a head, “and the class of people who actually consented to “go was not of much value to employers of labour. The emigrants gave a great deal “of trouble; and the experiment was most unsatisfactory as far as Burma was “concerned.” It was even more unsatisfactory as regarded Assam. The tea planters were unwilling to enter into contracts with emigrant-coolies, especially during a year of scarcity; it was evident that unless liberal bounties were allowed and a large recruiting staff entertained, no success would be obtained; and the scheme was abandoned in January 1874.

97. *Prices*.—With regard to prices, there is very little to be said, seeing that they were artificially kept down by the presence of the Government granaries and the resolution to open these for the use of the labourers, and ultimately for sale to the general public, whenever the market rates rose to 10 seers per rupee. But in the earlier months, before these preparations were complete, indications existed which led observers to the belief that prices would have risen very high had it not been for the import of the Government grain. Sir R. Temple says¹—

“In some places” (of North Behar) “the price of rice was a rupee for 9, 8, or 7 seers; in other places, it was even 1 rupee for 6 and 5 seers, which rates indicated famine. In other places, there was no price quoted, as the article was not procurable at all.”

And throughout the period of famine the prices at Patna and its neighbourhood were sufficient to make it worth while for private trade to pour in by railway from the Punjab, the North-Western Provinces, from Oudh and Central India, and from Lower Bengal, nearly 400,000 tons of grain.

98. *Effects of lowering the Railway Freight*.—The order reducing the freight of food grain on the railways by one half, or to $\frac{1}{3}$ of a pie per maund per mile, or one anna per 100 miles, was in force from the 1st November 1873 to the 1st August 1874; Government paying to the railway companies as compensation the amount foregone by them, or one anna per maund, or Rs. 1–12 per ton for 100 miles. The total sum paid as compensation was stated¹ to be Rs. 45,30,000. It is not said how this calculation was made: but in March Mr. Bernard had estimated² that every ton travelled 400 miles on an average. If this estimate hold good, the amount paid represents 647,000 tons brought in by private trade. If the compensation was paid (as estimated above, paragraph 60) on 383,000 tons, then each ton of grain travelled on an average nearly 700 miles. Against this expenditure may be set the profit brought to the Government by the increased railway traffic which the famine created, and which Sir R. Temple calculated at Rs. 63,23,150.³

¹ B. B. II, 125. (T.) Only 1,199 of these were from Behar. See Mr. Toynbee's reply to Famine Commission.

² Government of Bengal, to Famine Commission, dated 8th February 1879.

³ B. B. II, 82. (T.)

¹ *Ib.* II, 110. (T.) But in Colonel Dickson's note of 29th November 1875, it is stated as Rs. 45,60,000.

⁵ *Ib.* I, 234.

⁶ Of this, Government paid Rs. 33,30,000 for the transport of its own grain. The net increase on all railways in India, excluding the above sum, was Rs. 6,70,000 for 1874–75 (*vide* Colonel Dickens' note, *ut supra*).

The Government of India recorded,¹ in the Resolution of 18th February 1875, that the effect of the measure had been "to stimulate the importation of grain by railway " into the distressed tracts;" but there is nothing to show in what way it was believed to have acted, whether by making it profitable to despatch grain from great distances which under the higher rate of freight would have been prohibitory, or by putting additional profit into the pockets of the despatchers who would have found the trade sufficiently advantageous even at the ordinary rates of freight.

99. *Treatment of Subjects of Native States.*—It was at one time feared that Nepal would have to be added to the famine-stricken area;² and the question arose how far the people of that country were entitled to share in the measures of relief designed for Bengal. Sir R. Temple decided that if Nepalese subjects applied for work on relief, they should be treated in the same manner as British subjects, even though their number were thought likely to be as large as half a million (see paragraph 47), and that grain should be supplied to the Nepalese Government at cost price. But in the end it was found that only 1,000 tons of grain were applied for on these terms, and the Nepalese got through their difficulties without any further assistance.

100. *Lesson for future Guidance drawn by the Supreme Government.*—The Government of India reviewed Sir Richard Temple's final Minute in a Resolution³ dated 18th February 1875, and drew the following conclusions for the guidance of future administrators from the experience gained in 1874. The first point dwelt on was the necessity of obtaining early and complete reports of the extent of any failure of the crops, and of the probable consequences on the food-supply of the people. The next was the importance of strengthening the district staff, so as to set the officers free to learn the actual condition of the people. With regard to relief-works it was laid down that "large works should be opened at once, smaller local works subsequently, as the " necessity for them arises. When the distress becomes extensive, it is essential that " employment should be available near the usual homes of the people." When the numbers are very large, "piece-work is preferable to other methods for their payment." In the most distressed districts "the tests of cooked food and of poor-houses are inapplicable." The giving advances to cultivators was found very useful. The food-supply should be looked to, and "where there is a great deficiency, and good reason to believe that the traders will be unable to meet that deficiency, it may be right for the State to intervene for the purpose of supplementing the general food supply. In doing this, it was better to draw supplies from a distance, and to try by private arrangement with merchants rather than for Government to appear openly in the market. Great advantage has resulted from reducing the railway rates for the carriage of grain.

No doubt the quantity of grain imported had been excessive; but for that the Government of India was solely responsible.

"Having to deal with so vast a population, whose support depended upon many uncertain contingencies, it would have been imprudent not to have been prepared to meet larger demands than those which were actually made upon the Government. If a substantial reserve had not been provided, the success of the relief operations would probably have been attributed rather to good fortune than to foresight. The experience of last year shows the necessity of such a reserve. In the beginning of September 1874 very great apprehensions were felt that the scarcity would be prolonged. This was only averted by a fall of rain at the very last moment when it could have been of use to allow the winter crops to be sown; and if the rain had not then fallen, the rice in reserve would have been urgently required. It must not be forgotten that on previous occasions it has occurred that a second year of drought has followed the first."

DISCUSSION OF THE RESULTS OF THE FAMINE ADMINISTRATION.

101. *Statistical summary of expenditure and relief.*—The following statement shows the cost of the famine according to the figures drawn up by Sir R. Temple on the 31st October 1874, and two columns have been added to compare therewith the estimates which were made at two intermediate periods. It is instructive to observe how the expenditure increased as the principles of relief relaxed and the measures adopted grew in liberality and breadth. The figures in the column for actuals are taken from the Budget statement of 1875-76,⁴ except those for advances recovered, which are from paragraph 94. The Budget Statement takes no notice of advances on either side of the

¹ B. B. II, 64.

² *Ib.* I, 223.

³ *Ib.* II, 61.

⁴ See page 58, the Budget Statement of 1876-77, p. 84, however without giving details, states the net expenditure at Rs. 6,75,85,330 including Rs. 65,60,000 brought to account in the preceding year omitted till then. Against this set-off is allowed of Rs. 17,00,000 from increased Railway Traffic, leaving a total charge of Rs. 6,59,85,330, or six and a half million sterling.

account, but notes that about half a million further was expended out of Provincial or Local Funds.

EXPENDITURE.

Items.	Estimate of 4th March.	Estimate of 13th April.	Sir R. Temple's figures.	Actuals (as far as known).
	Rs.	Rs.	Rs.	Rs.
Special Establishments - - -	5,00,000	13,50,000	12,00,000	25,00,000
Promotion of private grain trade - -	15,00,000	34,00,000	45,30,000	45,60,000
Relief-works - - -	1,00,00,000	2,53,00,000	1,28,00,000	1,10,80,000
" excluded from local or private funds.	—	—	—	65,60,000
Grants in aid of private works - -	5,00,000	5,00,000	1,00,000	—
Darbhanga State Railway - - -	—	20,00,000	10,00,000	14,50,000
Government grain purchase - - -	3,00,00,000	3,78,40,000	4,40,00,000	4,47,06,000
" " transport - - -	1,44,50,000	1,75,00,000	1,76,00,000	1,76,28,000
" reserve transport train - -	—	18,60,000	31,40,000	31,50,000
Charitable relief - - -	10,00,000	20,00,000	28,00,000	31,71,000
Advances to zemindars, traders, &c. -	50,00,000	50,00,000	46,00,000	46,00,000
Unforeseen - - -	15,00,000	—	—	—
Total expenditure - -	6,44,50,000	9,67,50,000	9,17,70,000	9,94,05,000

RECEIPTS.

Items.	Estimate of 4th March.	Estimate of 13th April.	Sir R. Temple's figures.	Actuals (as far as known).
	Rs.	Rs.	Rs.	Rs.
Sales of grain to labourers and the public -	1,50,00,000	1,83,30,000	95,00,000	2,62,40,000 ¹
Sales of grain to Relief Committees -		15,00,000	27,00,000	
Sales of reserve grain in Calcutta -		37,80,000	7,00,000	
Sales of surplus grain in the interior-			30,00,000	
Recoveries of cash advances to traders, ze- minders, &c.	—	45,00,000	46,00,000	31,00,000
Recoveries of price of grain advanced to ryots	—	71,40,000	62,50,000	—
Miscellaneous - - -	—	—	5,00,000	—
Increased Railway profits - - -	—	—	63,23,000	40,00,000
Total receipts - -	1,50,00,000	3,52,50,000	3,35,73,000	3,33,40,000
Net expenditure - -	5,00,00,000	6,15,00,000	5,82,00,000	6,61,00,000

¹ This includes sales of surplus stores, carriage, and steamers, and probably also the recoveries of price of grain advanced to ryots, as far as then known.

At this cost 735,000 labourers were employed for nine months; 452,000 were gratuitously fed for six months; 118,000 tons were sold during a period of seven months (April to October); and assuming that each person bought $1\frac{1}{2}$ lbs. a day or 315 lbs. during the seven months, this quantity would supply 870,000 persons with food. If, again, a quarter of the labourers on relief-works were purchasers, there were about 700,000 of the public who benefited by the sale of Government grain at two-thirds of the cost price. The number who received advances of grain has been estimated at about 400,000 cultivators, or, including their families, 2,000,000 souls; and the number who benefited by the advances of cash to zemindars, traders, &c., was roughly estimated at 500,000. The following, therefore, is the number who in one form or another received relief:—

	Number.	Period.
By relief-works - - -	735,000	9 months.
" gratuitous relief - - -	452,000	6 "
" sales of grain - - -	700,000	7 "
" advances of grain - - -	2,000,000	
" " cash - - -	500,000	7 "
Total - - -	4,387,000	

or about 25 per cent.² of the population of the famine tract, as estimated in paragraph 19.

² Mr. Kirkwood states that at one time fully 80 per cent. of the population of some parts in the North of Bhagulpur were subsisting on Government relief in some form or other.

102. *District details of expenditure and relief.*—The relief administered may be shown in a different way, and the amount received in each District can be more easily compared, by assuming that the relief lasted for seven months, that each person who bought or received an advance of grain got 23 seers for a month's consumption, or 161 seers for seven months, at which rate every ton sold or advanced relieved almost seven persons: and similarly that every one who received an advance of cash received relief at the rate of 1 anna a day, or Re. 1-14 a month; so that every sum of Rs. 13-2 thus advanced relieved one person. This is the assumption made in Mr. MacDonnell's book, and it is subject only to one flaw, *viz.*, that the labourers who received wages in cash also bought grain and thus appear twice over in the number of relieved. By the system of calculation adopted in the table it appears that in the most distressed tracts 2,600,000, or 17 per cent. of the entire population, were relieved for seven months continuously, in the less distressed tracts 517,500, or 3 per cent., were so relieved. If it be assumed that half the labouring population bought Government grain and are shown twice over, these numbers will be reduced to 2,200,000 and 512,000 respectively, or 15 and 2.9 respectively:—

Districts.	Population.	Grain Imported. Tons.	Surplus unexpended. Tons.	Cash expended. Rs.	NUMBER OF PERSONS RELIEVED DAILY FOR SEVEN MONTHS.				Per cent. of number relieved to population.
					Relief works.	Grain bought on Rept.	Cash and Grain.	Total.	
Saran - - -	2,064,000	30,200	3,800	2,110,500	160,162	5,170	217,915	33,277	19
Champaran - - -	1,441,000	29,180	1,600	981,900	71,729	11,031	155,719	29,161	17
Darbhanga - - -	2,196,000	118,745	38,875	3,179,900	265,427	111,511	372,509	719,150	34
Muzaffargarh - - -	2,188,000	60,352	13,283	1,163,600	160,662	21,919	251,221	137,796	20
Bhagalpur (North half) -	957,000	26,318	6,218	160,600	25,107	27,726	111,621	161,751	17
Purneah - - -	1,714,000	21,802	2,191	522,700	13,230	11,613	115,367	118,210	8
Dinajpur - - -	1,501,000	39,671	7,961	1,272,100	56,780	32,227	210,151	299,158	20
Rangpur - - -	2,149,000	12,955	2,925	781,800	17,880	16,687	71,133	108,700	5
Bogra - - -	689,000	9,811	2,262	368,500	15,787	17,212	37,871	70,873	10
Total most distressed tract.	14,899,000	362,070	79,118	11,770,600	791,731	261,129	1,519,531	2,600,109	17.4
Shahabad - - -	1,731,000	4,781	638	210,376	6,511	1,788	21,364	32,691	1.9
Gya - - -	1,950,000	3,073	218	92,673	1,117	1,112	20,602	23,131	1.2
Monghyr - - -	1,812,000	8,158	103	403,300	7,250	3,635	62,269	73,171	4
Saundalia - - -	1,359,000	7,120	1,150	189,000	11,799	1,315	28,260	41,103	3.5
Maldah - - -	676,000	3,916	228	182,200	1,931	5,637	20,920	31,977	1.7
Murshidabad - - -	1,353,000	4,270	182	331,800	3,011	9,235	7,951	21,277	1.6
Rajshahi - - -	1,311,000	4,685	1,860	233,700	2,156	19,781	11,189	36,108	3.5
Pobna - - -	1,212,000	584	2	101,200	1,383	1,063	8,361	15,810	1.1
Birbhum - - -	696,000	3,719	190	175,900	6,412	17,165	11,094	31,671	5
Bankura - - -	527,000	3,180	76	235,500	3,053	15,101	15,283	33,710	6.4
Bardwan - - -	2,034,000	13,380	2,067	679,600	7,211	35,835	29,121	72,320	3.5
Nodiya - - -	1,813,000	883	20	315,100	3,473	17,119	—	20,622	1.1
Manbhum - - -	996,000	8,830	529	267,600	7,112	9,805	49,531	66,718	6.7
Jalpalguri - - -	418,000	3,321	179	91,408	—	—	—	32,330	7.9
Total partly distressed tract.	17,791,000	69,290	7,939	3,561,737	69,212	126,181	292,598	517,503	3

103. *The good side: no mortality.*—One result at least was attained by this lavish administration of relief that there was absolutely no mortality from starvation. As might have been expected in a matter to which public attention was so riveted, every death that could possibly be attributed to starvation was eagerly canvassed, and its causes closely investigated; but at the outside not more than 22 deaths could be said to have even been accelerated by hunger. Another point which may be noticed with satisfaction is that there seems to have been no permanent evil effect left on the minds and habits of the people: with one or two exceptions, such as have been noticed at Bardwan, they seem to have shown no willingness to continue to be treated as paupers, but to have gone back to their fields and ordinary occupations as soon as the first harvest was ripe.

104. *The other side: the means disproportioned to the end.*—But it is not sufficient for the advocates of a new policy, which deserts the old landmarks and cuts itself adrift from past experience, to prove that they effected their purpose: it is necessary also to show that the means employed were proportionate to the end aimed at, and that the resources of the State were not unduly wasted. In this respect the administration of the Bengal famine of 1874 can hardly be justified. A few paragraphs may well be devoted, at the conclusion of this section, to considering (1) what would be the effect on the finances of India if the principles of 1874 had been followed throughout the century; (2) how far those principles can be pronounced to have been correct in their application to the facts of 1873-74; (3) whether they were correct under any circumstances, or were altogether untenable.

105. *Cost of other famines, if treated on the Bengal system.*—It has been shown that on the relief of a population of 17 millions who were believed to be visited by severe famine, the sum of six million sterling was spent. Let it be assumed that this rate of expenditure was a proper one,¹ and that a similar rate would have been proper in all the greater famines with which India has been afflicted during the present century. Such a comparison must needs be a rough one, for the famines varied in intensity, and the circumstances of the different parts afflicted were different; but without wishing to push the argument too far, and with all reservations made, the following table fairly represents what the expenditure on these famines would have been, had they been treated as that of Behar was treated in 1874:—

Year.	Province.	Duration of Famine.	Population severely affected.	Actual cost of Relief.	Expenditure at the assumed rate.
		Years.	(Millions.)	(Lakhs of Rupees.)	(Lakhs of Rupees.)
1803	North-Western Provinces - -	1	10	32	353
1813	Bombay - - - - -	1	4	Nil	141
1833	Madras - - - - -	1	8	3	282
1837	North-Western Provinces and Punjab	1	15	118	530
1851	Madras - - - - -	1	1½	21	44
1861	North-Western Provinces and Punjab	1	13	57	459
1866	Madras - - - - -	1	13	25	459
	Orissa - - - - -	2	5	127	353
	Behar - - - - -	1	4½	2½	159
1868-69	North-Western Provinces - -	1	6½	}	230
	Ajmir - - - - -	2	½		35
	Punjab - - - - -	1	3		106
	Central Provinces - - - -	1	4½		159
	Bombay - - - - -	1	3		106
			91	157	3,416

Whereas 4½ millions sterling actually was spent, more than 34 million sterling would have been spent in relieving famine. The addition of 30 millions to the debt of India would have increased the annual expenditure by a million and a half; and though it is too much to say that the finances could not have borne the strain, still undoubtedly it would have been severely felt.

106. *Error of the forecast: extent and degree of the famine overrated.*—But the premise on which the preceding paragraph is based, *viz.*, that a population of 17 millions was in danger of being visited with severe famine, is one that cannot be altogether accepted. It has been made clear that the forecast of the Local Government was unnecessarily gloomy, and that the estimates of the stocks in reserve, of the crops raised in 1873-74, and of the power of the population to endure scarcity, were much too low. Later inquiries, imperfect as they are, have shown that even in the districts which were hardest hit the deficiency of food was much slighter than had been supposed. The Government of India, in the closing Resolution of 18th February 1875,² admitted this to some extent. They wrote—

PANA. 10.—“The anticipation of the effects of the scarcity was found to be somewhat greater than the reality, from two causes. The stock of food in the hands of the people turned out to be larger than was anticipated; and sufficient allowance was not made for the extraordinary exertions which were used by the cultivators to grow a greater quantity than usual of the grain crops which ripen in the autumn. It was impossible to reckon beforehand upon either of these circumstances; but the experience that has now been gained shows, *first*, that where a scarcity follows a fair season considerable supplies of food will probably be in the possession of the people; and, therefore, sufficient time may be

¹ No doubt it may be urged that the greater part of the Bengal expenditure was due to the importation of grain, a policy which in some of the previous famines was unnecessary. But although the arguments of 1873 could hardly have been applied in that year to the Upper Provinces, they would assuredly have been held applicable, by the persons who were convinced by them, to all parts of India, in the years when railway communications were not fully developed; that is, in every previous famine, except that in the North-Western Provinces and Punjab, in 1868-69. Moreover, on the other hand, one measure of relief was cut off from Bengal which has always been applied in other Provinces, *viz.*, remission of revenue: it was impossible to advocate this in Bengal, whereas in some Provinces it had been the chief or only measure of relief, and out of the 457 lakhs of rupees expended on past famines 172 lakhs were remissions of revenue. If the Bengal settlement had not been a permanent one, there can be little doubt (from the precedent of Orissa in 1867) that another two millions would have been added to the Government expenditure. As it was, Rs. 28,649 were remitted in the Santhal District and Rs. 308 in Singbhum.

² B. B. II, 62.

reckoned upon for the purpose of organising the relief which may ultimately be required ; and, *secondly*, that the cultivators of the soil in India are able and willing to make considerable alterations in their agriculture for the sake of increasing the food-supply at the earliest possible moment, by which means the period over which the scarcity would otherwise extend is considerably shortened."

107. *Attempt to frame an ex-post-facto estimate of the real area of the Famine.*—It is impossible now, with the imperfect information which still exists as it did then, to state with precision, or in such a way as to carry conviction, what the limits are within which severe famine, if it existed at all, would probably have been confined ; but there are many indications which lead to the conclusion that the area of extreme distress was the basin of rice land lying along the edge of the Tarai, in the north of Champaran, Muzaffarpur, Darbhanga, and Bhagalpur. This is the tract where rice is the prevailing crop, and it was the winter rice alone that failed extensively. Elsewhere it is clear that the purchasing power of the people, and the activity and enterprise of trade, were underrated. In Saran and the southern parts of Champaran and Tirhut there was no catastrophic failure of the crop : in Dinajpur, Purneah, Rangpur, and Bogra the people could hardly be got to accept direct relief even at extravagant rates of pay ; all they would consent to do was to buy grain below the market price ; and all through the famine these districts were exporting food grains briskly. No emigration existed to more favoured tracts even on the part of those who have no permanent tie to their homes and no share in the village organization. With a very few exceptions, no signs of emaciation were seen. There are many indications which combine to show that in these tracts, at any rate, the pressure of famine was not severely felt.

108. *Importance of an accurate forecast.*—Now this mistaken estimate was responsible for two things : first, for the vast scale of preparations made for the relief of tracts and of whole districts which were not severely affected ; secondly, for the doctrine that all tests ought to be abolished, a doctrine which sprung from the belief that in a country where almost every one was famine-stricken there could hardly be such a thing as an unworthy applicant for relief. Thus, on a review of the whole proceedings, the main lesson to be learnt from the history of this famine seems to be the immense importance of a sound and accurate forecast ; and in order to secure this, the main and all-essential requisite is a complete system of agricultural statistics based on a field-survey.

109. *Discussion of the policy of importation.*—Even if the forecast had been correct, and the threatened famine as severe as was supposed, there are two leading details of the system of relief, the propriety of which may be canvassed ; these are (1) the policy of Government importation, (2) the substitution of personal knowledge for self-acting tests. As to the first, it is difficult and hardly necessary to give an opinion. The opinion of the local officers seems to have been unanimous that in the northern parts of Behar private trade would not have thrown in grain in sufficient quantities to supply the wants of the people. Against this it has been urged that under all the disadvantages of Government competition and its almost monopoly of the transport, Sir G. Campbell did see grain brought by private traders into Darbhanga, and that no greater difficulties existed here than were overcome by the merchants who in 1877 carried grain to the south of Kaladgi and Belgaum, to Harpanhalli in the Bellary District, and to Shimoga in Mysore. But the fact remains that the action of Government itself prevented this question from being brought to the test of experience, and no one can say with certainty what the results would have been had private trade been left to itself. Moreover, it is generally agreed that, now that these northern districts have been opened out by the Darbhanga State Railway and by improved communications, the necessity of Government importation can never recur. That more grain was imported even to North Behar than was necessary, that much was thrown into places commanded by the railway and the river, where private trade might certainly have been relied on, and that the principle of making provision against a possible second failure of the rains was a mistaken one, are matters on which opinions can hardly be said to differ.

110. *The effect of the abolition of tests.*—As to the second point, it may be safely declared that the famine of 1873 does not establish the principle that it is possible to organise a system under which the relieving officers shall be able to judge, solely by personal knowledge, of the wants of the applicants. However excellent and efficient the inspecting establishment was, there is nothing to show that it would not have been desirable for them to employ the test of work as a condition of relief in the case of all who were able to work ; and it is obvious that if this had been done it would have left the officials freer to inquire into the circumstances of the residuum who were unable to work. It is admitted that the relieving officers found it impossible to test the reality of the wants of ryots who applied for advances, and yet it is easier to obtain personal

knowledge of the circumstances of men who possess some landed property, than of those who possess none. It is admitted that they could not judge as to rejection or admission by the appearance of the applicants, because, with a few exceptions in March and April, all looked sleek and well-to-do. It is admitted that the wages given on the relief-works were often larger than could be earned in non-famine years, and that the pauper was able to buy more food than the frugal and industrious self-supporting labourer. These considerations, coupled with the fact that a far greater proportion of the population was in receipt of relief than has ever been known before or after, cannot but throw great doubt on the wisdom of the policy pursued; and seem to compel the conclusion that it would have been wiser for the Government to have enforced the old and approved policy of restricting its assistance in the great majority of cases to the giving of employment on large and useful public works.

SECTION II. —NORTH-WESTERN PROVINCES.

1. *General character of famine tract.*—The North-Western Provinces felt but slightly the effects of the drought which was causing so much suffering in Behar. There were two separate distressed areas. First, the Sulhi-Himalayan tract in the east of the province, comprising the northern portion of the districts of Gorakhpur and Basti. Here, as in Northern Behar and Bengal, the main crop of the year and the common food of the people is the winter rice, and that crop failed generally for want of rain. Adjoining these two districts, there was also a certain amount of suffering in Ghazipur, a district of very dense population, and where among certain classes of the people poverty is chronic. The second tract includes most of Bundelkhand, that is, Jhansi, Banda, and Hamirpur. The agricultural population of this tract had been struggling with a succession of bad years, which had impoverished landlord and tenant, while the cultivated area had in many parts been seriously diminished by the spread of *kans* grass. Thus the bad autumn harvest of 1873 found the people at the end of their resources. The southern part of Mirzapur, a hilly and thinly-peopled country, may be classed with this tract.

The following table shows the area and population of both the famine tracts :—

District	AFFECTED PORTION.	
	Area, Sq. Miles.	Population.
Gorakhpur, Northern portion - - -	2,028	686,000
Basti, Northern portion - - -	1,158	601,000
Ghazipur, Eastern portion - - -	532	352,000
Banda - - - - -	2,908	697,000
Hamirpur - - - - -	367	95,000
Jhansi - - - - -	1,567	317,000
Mirzapur (south) - - - - -	2,632	173,000
Total - - -	11,192	2,921,000

2. *Ruins of 1873.*—The rainy season of 1873 began late and ended early.¹ Some slight showers fell, after dust-storms, about the middle of June. Then the hot westerly winds set in again, and lasted till the rains broke on the 2nd of July. They ceased early, closing on the 9th September in Banda, and by the 18th of September the rainy season was everywhere at an end. It had been interrupted by several breaks, and the deficiency of rainfall and the effect of its too early cessation were especially felt in the rice-growing eastern districts. The following table compares the rainfall of 1873 in these parts with the average rainfall for a number of years :—

District.	Rainfall, in inches.	
	1873.	Average.
Benares - - - - -	36·26	40·49
Gorakhpur - - - - -	39·60	46·36
Basti - - - - -	23·7	49·76

} Average of
 } 20 years.
 } Average of
 } 10 years.

¹ Administration Report, N.W.P., 1873-74, pp. 2, 3.

The Benares and Gorakhpur figures for 1873 include the rainfall up to the 1st April 1874, and thus represent the deficiency as less than it really was.

The Gorakhpur district is the only one for which the monthly figures are obtainable. They are as follows:—

—	June.	July.	Aug.	Sept.	Oct.	Nov.	Total.
1873 - -	8.90	12.30	14.30	2.50	- -	- -	38
Average - -	6.48	12.92	11.79	8.68	2.76	0.23	42.86

The result of this deficiency of the monsoon was that in all the eastern districts the kharif crop was short, and the rabi crop was sown with unfavourable prospects, and on a smaller area than usual. But where a late winter rice crop is grown, and is followed by a rabi crop of coarse grain, such as grain or pulse, which is the case in the northern parts of Gorakhpur and Basti, the early cessation of rain meant a general failure of the year's crop; and the authorities of the North-Western Provinces, knowing how similar the character of this tract was to the character of that part of Behar in which the expectation of a most grievous famine was then filling the minds of the people, began to make preparations for a somewhat similar calamity.

3. *Good effect of the winter rain.*—Everything, however, depended on the winter rains, which always make the difference between a bad and a good harvest; and this year, the ground having been drier than usual at sowing time, the harvest without them would have been exceptionally poor. The rain held off unusually late, and in January a frost, such as had not been known for years, set in, and continued for some days, and burnt up the pulses, peas, and more delicate crops. “At last, however, the long-delayed rain fell in the first week of February, and the heavy calamity which seemed to be impending was averted. Though too late to do all the good which it might have done had it fallen at the usual time, it was of incalculable benefit, and through its influence a year of high prices was substituted for a year of famine.”¹

4. *Remission and suspension of revenue.*—In the worst part of the Gorakhpur district, the Maharajganj Tahsil, half the rabi instalment of revenue was remitted,² and some moderate arrears were allowed to accrue, no one being unduly pressed to pay his revenue in the distressed districts. The remissions in Gorakhpur amounted to Rs. 67,869; besides which over Rs. 30,000 were remitted during this and the following year in the trans-Jumna districts, partly on account of the drought of 1873, and partly because of the impoverished state of that part of the country. Similarly, the excise revenue in this province and also in Oudh fell off considerably; but it is impossible to say what exact sum should be attributed to the effects of the scarcity.

5. *Prices.*—Prices did not, as a rule, range so high as to indicate famine.³ In Gorakhpur and Basti wheat in March and April sold at 14 seers per rupee, barley and grain being considerably higher. Rice, however, rose to 11 seers in February, and 10½ from April to June, in Gorakhpur; in Basti it was at 9 seers in February and March, and at 8¾ in April, May, and June. The ordinary rate would be about double this, or 16 seers per rupee.

6. *Encouragement of private trade.*—It was urged here, as in Behar, that the distressed tracts were in the habit of exporting, not of importing, that no food stocks existed, and no crop had been harvested, and that private trade would not supply the deficiency. Sir W. Muir would not entertain the idea of Government importation, but preferred to stimulate private trade by advances of money. In Gorakhpur advances were made without interest, repayable in a year, to traders who undertook to store grain in specified places, such grain being purchasable by the Government at a price fixed, so as to cover the expenses of the trader; while those who preferred to import grain for sale at their own discretion received advances repayable without interest in six months. The quantity stored under the former plan was 90,865 maunds, and under the latter plan 10,700 maunds were imported. No actual use was, however, made of the stored grain, the capabilities of the country turning out to be greater than was expected; and of the sums thus advanced Rs. 14,200 had to be remitted ultimately, to cover the losses of the traders and the damage done to the grain. Besides these sums, advances were made to zemindars and ryots to buy seed-grain; the amount thus advanced was Rs. 91,470 in Gorakhpur, Rs. 43,209 in Basti, and about Rs. 20,000 in Mirzapur.³ All this was ultimately recovered.

¹ B. B. II, p. 133.

² *Ib.* II, pp. 136-7.

³ *Ib.* II, pp. 133 and 140.

7. *Relief-works.—Wages.*—The system on which the Government proposed to deal with the famine was the same as had been adopted in 1861 and 1868:¹ relief-works were to be started to employ the able-bodied poor, and those who were unable to work were to be relieved by private charity, which the State should assist, but should not bear the whole burden. The execution of all relief-works was made over in February 1874 to the Public Works Department;² all were to be carried on on the daily wage system, and a Resolution issued on the 10th February fixed the rate of wage. The maximum was to be $1\frac{1}{2}$ annas for a man, 1 anna for a woman, and $\frac{1}{2}$ anna for a child; and below this maximum the rate was to vary with the price of food, so as to be sufficient to enable each person to buy the following quantities:—

	Flour.	Vegetables.
	oz.	oz.
Adult male - - -	16	4
„ female or child above 10 - - -	12	2
Child under 10 - - -	8	2

Looking at the Gorakhpur and Basti prices of the time, it was ruled that the rate of wage for those districts should be (in the local Gorakhpuri pice, of which 5 go to an anna,) 6 to a man, 4 to a woman, 3 to a child.

In Ghazipur a higher rate was paid than even the maximum sanctioned by Government: men got $1\frac{3}{4}$ annas, women $1\frac{1}{4}$ annas, children $\frac{3}{4}$ anna. In February and April these rates were successively lowered, till in May they were fixed at 1 anna, $\frac{3}{4}$, and $\frac{1}{2}$ an anna.

8. *Increase of numbers employed.*—During the early months the numbers employed on the relief-works continued low, and when the spring harvest came in they diminished rapidly. In Ghazipur they fell from 3,000 in the end of February to 800 in the middle of April; in Mirzapur from 2,000 in February to 300 in March; in Banda from 7,000 or 8,000 in March to 900 in April; in Gorakhpur and Basti alone there was no decrease. Early in April the numbers were 80,000 in the two districts; and by the beginning of April they had risen to 219,000. One reason for this was, that the area sown with rabi had been so small in those parts.³

“ But the large and increasing proportion of women and children could not escape notice, and there were considerable doubts as to the extent of the distress which prevailed. On the one hand, it seemed that the relief-works might be popular on account of the difficulty of exacting a full day's labour from the crowds who thronged to them, and the liberty they enjoyed, and on account of the wages being paid in cash at a time when agricultural labour was very slack and there was nothing else for the people to work at. On the other hand, there was the hypothesis that these works were the sole refuge of a famished and despairing population, whose only means of supporting life was by the wages earned on them.

“ Sir John Strachey lost no time, after assuming the reins of government, in visiting the distressed districts, in order to form his opinion with the aid of the best local advice. The conclusion he came to was, that, on the whole, the former explanation was the correct one, and that there was not really any such severe distress as to deserve the name of a famine. He decided that it was not advisable to close the works, but that efforts should be made to make the relief more distasteful by exacting a larger tale of work, and that the wages should be reduced to the minimum which would provide subsistence for the labourers. Evidence was adduced that the scale had, until lately, been too high, and that the relief-works had attracted sellers not of necessities only, but of luxuries. The rates now fixed were on the scale which had been introduced by the Magistrate of Gorakhpur about three weeks previously, the allowance for infants only being lessened by one-half. They were—

For a man - - -	5	Gorakhpuri pice (or 1 anna).
For a woman - - -	4	ditto.
For a child able to work - - -	3	ditto.
For an infant - - -	1	ditto.

“ Thus the exclusion of all who were not in need of aid was left to be gradually effected by the low rates of wages, and the strict demand of a fair day's work from every labourer.”

One result of this was, that a small number of labourers left the Gorakhpur works and crossed the Gandak to join the relief-works in Champaran, where they received 8 pice instead of 5.⁴ There was not, however, any general emigration in spite of the temptation thus offered.

9. *Measures taken to reduce the numbers, and their result.*—Lest any deserving persons should be deprived of relief by these measures, poor-houses were opened, in

¹ *Ib.* II, p. 138.

² *Ib.* II, p. 137. It appears from the reply of Mr. Stoker, then Assistant Magistrate of Gorakhpur, that he considered himself “absolutely prohibited from interfering with or giving any order concerning the works “under the charge of Department Public Works officers.” It was not, however, the intention of the Government to lay down any such principle as to the separation of the two Departments.

³ *B. B.* II, p. 134.

⁴ *Vide* Mr. Stoker's reply to Famine Commission.

which cooked food was provided for all applicants unable to labour, on the condition of residence, and of doing such light work within the enclosure as would be given them; exceptional measures of relief were sanctioned for "pardanashin women," or for others who, on account of caste or other feelings or prejudices, were prevented from accepting the assistance offered on these terms. The change thus made in the system coincided in point of time with an exceptionally early monsoon.¹

"Towards the end of May, after a few partial showers, the demand for agricultural labour began to make itself felt in Gorakhpur, and from all the works there set in a steady flow of labourers to the fields. On the 30th May rain fell generally throughout the district, and the numbers in daily attendance on relief-works, which had been 89,000 during the last week of the month, sank to 25,000 in the first week of June. The rains had now thoroughly set in, and a few days later the last relief-work was closed, and the three work-houses were opened for the destitute who still claimed assistance."

The following remarks embody the conclusion arrived at by the Lieutenant-Governor as to the reality of the distress and as to the proper measures to be adopted in similar circumstances:—

"These events completely justified the conclusions arrived at by Sir John Strachey on visiting the locality, and they deserve special and prominent record on account of the importance of their bearing on the treatment of future famines. It appears probable that in a slack season of the year the opening of Government relief-works would always attract great crowds of labourers. In a season of considerable pressure, but not of absolute famine, the relief-works in Gorakhpur and Basti were for some weeks daily thronged by more than 200,000 men, women, and children, who found an attraction in the light work, in the liberty of going at night to their houses after attending a sort of vast picnic during the day, and in wages earned at a time when ordinarily they had no employment in the fields and had to live on their harvest savings. But when the wages were cut down to a mere subsistence allowance, when a full day's labour was insisted on, and when the liberty of living at their homes was threatened, these immense crowds melted away as rapidly as they had collected, and it was found that there was hardly any one who really stood in need of relief."

10. *Statistics of the relief-works.*—The returns of the numbers employed were not very carefully kept, and cannot be compiled with absolute accuracy from the official records. The monthly numbers entered in the table below² are taken from the report of the Central Committee³ where they were received from the Public Works Department, but they do not show all the months—only those in which relief was most extensive. On the whole, however, it appears, from a comparison with the casual notices in other reports, that they cannot be much below the mark, though somewhat too low.

	Average daily number.
January (about)	2,000
February	7,806
March	40,996
April	133,769
May	208,168
June	83,150
Total	476,189

Looking only at the four worst months, the average number employed from March to June was 119,047.

¹B. B. II, p. 135.

² Number of People employed on Relief Works in the North-Western Provinces in 1874.

DISTRICT.	January.	February.	March.	April.	May.	June.	Total number employed.	Average number.	Period.	Cost per Head.	Total Cost.	Date of the opening of works.	Date of closing the works.
Gorakhpur	—	—	21,825	73,201	78,059	29,341	202,489	50,622	Months. 4	Rs. A. P. 1 9 0	Rs. 3,20,414	End of January	Middle of June.
Basti	—	5,000	13,000	50,097	125,908	49,935	250,540	61,355	4	1 11 4	4,28,557	22nd January	22nd June.
Ghazipur	—	800	1,247	647	689	956	4,345	860	5	3 0 3	13,110	Early in February	Last week of July.
Mirzapur	over 2,000	about 2,000	300	—	1,300	—	—	—	—	—	23,130	End of December	21st June.
Banda	—	—	3,916	911	329	—	5,285	1,057	5	2 8 4	13,219	End of January	End of June.
Hamirpur	—	—	—	1,323	1,540	1,955	4,818	1,600	3	1 4 4	0,145	Beginning of February.	June.
Jhansi	—	—	708	720	618	801	2,932	733	4	2 0 1	0,083	March	14th July.
Jalaun	—	—	Only one work with 180 persons.					—	—	—	—	—	—
Total	—	7,806	40,996	133,769	208,168	83,150	470,109	94,082	—	1 11 0	8,18,630	—	—

The last three columns are taken from pp. 138-40.

³B. B. II, pp. 157-59.

The total expenditure on wages was Rs. 8,16,630, or Rs. 1-11-5 per head per mensem: as however the real numbers were slightly larger than here shown, the real cost was slightly less.

11. *System of gratuitous relief.*—In February the Lieutenant-Governor (Sir W. Muir) called a meeting in Allahabad to invite the co-operation of public charity. A Central Committee was formed, and subscriptions to the amount of Rs. 64,995 were collected. Local Committees were appointed in the distressed districts, and the system of administering gratuitous relief was as follows:—¹

“Relief was given in the state of cooked and uncooked food and cash. The cooked and uncooked food consisted chiefly of the cheaper grains, such as dal, bajra, gram, barley, and common rice, and the flower of the *mahu* tree. The sick and infirm under medical direction received more nutritious diet. Relief in cash was distributed principally to *pardanashin* women. The miscellaneous expenditure (where it is not otherwise stated) includes these cash payments. It also includes charges for the construction of poor-houses, for the provision of culinary vessels, firewood, cotton for the employment of those able to spin, and medical assistance and medicines.”

12. *Statistics of gratuitous relief.*—The poor-houses started in Gorakhpur and Basti after Sir J. Strachey's visit, and managed under the orders referred to in paragraph 9, were kept up at the charge of Government, and the statistics of the cost of these are not distinctly given. In both districts the number in June was about 800. In Gorakhpur the maximum was reached in the end of July, when 1,500 was on the rolls; they stood at 1,000 in August, and rapidly diminished towards the end of the month; and in the third week of September all these poor-houses were closed. In Basti the number in August was 1,800, in September 1,200; October opened with 550, and by the 21st the poor-houses were closed. Of the other poor-houses, and other forms of gratuitous relief kept up at the expense of public charity, the following are the statistics:²—

DISTRICT.	1874.										Total Number.	Average Number.	Period.	Average Cost per Head of Rations.	Cost of Rations.	Miscellaneous.	Total Cost.
	February.	March.	April.	May.	June.	July.	August.	September.	October.								
Gorakhpur	1,351	1,179	1,203	681	280	319	241	69	—	3,821	723	Months.	Rs. A. P.	Rs.	Rs.	Rs.	
Basti	—	73	194	280	822	709	650	292	180	3,163	433	8	1 11 10	6,015	1,963	7,953	
Ghazipur	2,324	2,379	228	72	81	223	211	137	270	6,161	685	9	0 13 8	5,651	713	6,396	
Banda	—	1,559	1,159	921	180	203	83	51	11	4,331	483	9	1 1 6	4,717	2,313	7,063	
Hamirpur	161	219	204	138	65	229	695	690	253	3,787	121	9	1 1 0	1,113	2,337	6,530	
Jhansi	—	9	12	50	49	23	—	—	—	153	32	5	1 1 10	203	—	203	
Allahabad	—	69	257	400	311	21	—	—	—	1,091	219	5	1 8 0	1,611	401	2,015	
Central Oude	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1,302	1,303	
Total	3,705	3,317	3,423	3,234	2,810	2,163	1,935	1,159	723	21,812	3,001	—	1 2 6	23,813	15,097	43,010	

Of the balance, Rs. 8,354 were given to sufferers by fire and inundation in different places, and the rest, Rs. 12,460, was invested in Government paper against future contingencies. No contribution was asked for from Government, as the private subscriptions were more than sufficient to meet all the requirements.

13. *Total cost of relief operations.*—The total cost of relief operations of all kinds was Rs. 9,92,923, made up as follows:—

	Number relieved.	Period.	Cost to Government.	Cost to the Public.	Total cost.
Relief-works	119,047	Months.	Rs.	Rs.	Rs.
Gratuitous relief	2,760	4	8,16,630	—	8,16,630
Revenue remitted	—	9	41,689	52,535	94,224
Loss on advances of grain	—	—	75,497	—	75,497
	—	—	14,200	—	14,200
Total	—	—	—	—	1,00,551

Taking the affected population at 3 millions, the cost per head was R. 0-5-6.

¹ B. B. II, p. 154. It appears from the Gorakhpur reply to the Famine Commission that, in that district at least, uncooked food was the rule, and that residence was not insisted on.

² Compiled from B. B. II, pp. 160-63.

SECTION III.—OUDH.

1. *Famine tract*.—The northern part of the districts of Baraich and Gonda is a rice bearing tract, similar to that which adjoins it in Basti and Gorakhpur, and it was affected in the same way by the failure of the rains in 1873. The area distressed was about 2,900 square miles, with a population of 750,000 ;¹ but here too, as in the North-Western Provinces, the good spring harvest of 1874, followed as it was by early and favourable rains, prevented the distress from deepening into famine.

2. *Relief measures—System of relief-works*.—The Government resolved to meet this distress by providing employment on relief-works and as far as possible to discourage gratuitous relief.²

"The Chief Engineer, following the practice that has obtained elsewhere, suggested that Government should utilise the skilled and able-bodied labor which is available in times of distress at a lower wage than usual by employing them on remunerative works under the department, and would have referred all other labourers or distressed classes of the population to the district authorities to be fed by charitable relief. He would allow the professional supervisors of works to administer this charitable relief at poor-houses situate near the works, not as officers of the department, but as agents of the Deputy Commissioner. But it was clear that, under such a system, there would be at least as much scope for corruption and speculation as may exist under a system which employs on works all those who can work. We had not to deal with widespread famine actually existing:—all our efforts were directed to avert it. What concerned us first were the people: the return which we sought was not a good bargain wrung out of the labourers, but the preservation of the population in such a state of health, morally and physically, as to enable them at the proper time to resume their ordinary occupations as if the recent calamitous seasons had not occurred."

It was decided therefore to employ all people who would come to the works, however feeble (even little children who could hardly lift the smallest basket of earth), and to pay the daily wages, fixed at the lowest scale sufficient to provide food. The following table shows the rates as prescribed at first and as lowered afterwards in March, when the increased numbers showed them to be too attractive:—

	Early rates.	Later rates.
Skilled diggers - - - -	2 annas	-
Unskilled ditto - - - -	1½ "	1 anna.
Carriers (mostly women), - - -	1 anna	¾ "
Children - - - -	¾ "	½ "
Infants - - - -	-	¼ "

3. *Statistics of relief-works*.—The relief-works were—two irrigation tanks, a drainage channel, the embankment of a river, and the construction and repair of roads. They were for the most part opened in February and were closed in July and August; but the numbers became very small as soon as the rains began in the end of May. In Baraich the highest figures were reached in February, before the lowering of the rates; in Gonda the maximum was reached in May. The average monthly numbers are not recorded, but the following table shows the totals :³

	Total Number employed for one day.	Total cost of labour.	Rate per head per month.	Average number daily.	Period.
Gonda - - - - -	3,593,680	Rs. 182,512	Rs. —	23,958	5 months.
Baraich - - - - -	759,046	62,300	—	5,060	5 "
Fyzabad - - - - -	57,239	2,997	—	1,908	1 month.
Total - - - - -	4,409,965	247,809	1-11-0	30,926	

The total cost of the works, including establishment, compensation for land, &c., was Rs. 3,17,097, and the value of the work done at ordinary rates was calculated at Rs. 1,36,604, or 43 per cent, of the expenditure. The rates for earthwork are probably high in these parts, as the actual cost is said to have varied from Rs. 3-12 to Rs. 8 per thousand cubic foot.⁴

4. *Gratuitous relief*.—On gratuitous relief the expenditure was very small. In Fyzabad Rs. 1,114 was spent; and in Gonda a poor-house received 29,871 persons in all, or about 200 daily for five months. Nothing is said as to the system of management in these institutions. The total cost of gratuitous relief is not shown separately. Rs. 27,000 were contributed by the Calcutta Central Committee,⁵ but the report does not

¹ B. B. II., p. 168.² *Id.* II., p. 183.³ *Id.* II., p. 170.⁴ *Id.* II., 174 and 207.⁵ *Id.* II., p. 187.

state how this was spent. The Government expended the sum of Rs. 17,903 on miscellaneous charges, which may have been connected with this head, but the details are not given.

5. *Advances, and storage of grain.*—Advances amounting to Rs. 1,25,000 were made to help in importing grain; and the Deputy Commissioner of Gonda laid in a stock of about 37,000 mannds at the cost of Rs. 90,000. It was not used, and the loss on it and on unrecovered advances was expected to be about Rs. 40,000.

6. *Remission of revenue.*—The remissions of revenue were large, amounting to one-fourth of the whole year's demand in Fyzabad.¹ In Gonda one-fourth of the demand of five parganas was remitted; and in the rest the new assessment which would otherwise have been introduced was postponed. In Baraich a part of the revenue was remitted in six parganas and more was suspended.

These remissions, however, were not due to the drought alone; they were partly owing to this cause, but more to the fact that the revised assessment was greatly in excess of what had been taken before and had been imposed too suddenly before the subordinate shares had been adjusted, and partly to a combination of both these causes. The figures are² as follows:—

District.	Remissions due to		
	Over-assessment.	Drought.	Both causes.
	Rs.	Rs.	Rs.
Fyzabad - - -	4,18,894	—	—
Gonda . - -	2,61,170	³ 1,24,212	14,610
Baraich - - -	—	22,072	51,244
Total - - -	6,83,064	1,46,284	65,854

Perhaps half the figure in the 4th column should be added to column 3 to show the cost of the famine.

7. *Summary.*—The total cost of the relief measures may be thus summarized:—

—	Number employed.	Period.	Cost to Government.	Cost to Public.	Total Cost
			Rs.	Rs.	Rs.
Relief-works - - - - -	30,000	5 months.	3,17,097	—	3,17,097
Gratuitous relief and miscellaneous. - - -	—	—	17,903	27,000	44,903
Loss on advances and on storage of grain. - - -	—	—	40,000	—	40,000
Revenue remitted. - - - - -	—	—	1,79,211	—	1,79,211
TOTAL - - - - -	—	—	—	—	5,81,211

Taking the distressed population at 750,000, the total cost of relief was about Rs. 0-12-6 per head.

C. A. E.

The 5th July 1879.

¹ B. D. II, p. 179.

² Revenue Administration Report, 1872-73. pp. 18-25.

³ Of this sum, about one lakh of Rupees was remitted in favour of a single rich Talukdar, the Raja of Badrampur.

SCARCITY OF 1875-76.

[Compiled from the official Records of the Famine Branch of the (late) Revenue, Agriculture, and Commerce Department.]

1. *Brief History of the Scarcity. The first Warning.*—In the year 1875, again, there was an early cessation of rain in North Behar, and damage was done thereby to the winter rice crop. On the 8th November the Lieutenant-Governor (Sir R. Temple) wrote a minute in which he put the affected population at 17 millions, but trusted that “severity of loss or failure of crop” would be confined to parts of nine districts,* with a population of 8 millions. In these tracts the Bhadoi crop had been good, but the winter rice was believed to have failed to the extent of from a half to two-thirds, and it was anticipated that there would be great loss on the rabi, both from smallness of area and from failure of the seed to germinate

* *Viz.*, Champaran (two-thirds).
Darbhanga (six-sevenths).
Mozaffarpur (six-sevenths).
Saran (a half).
Sapul in Bhagalpur.
Gya (part of).
Purneah (part of).
Dinajpur (a third).
Rangpur (a fifth).

because of the dryness of the soil.

2. *The Lieutenant-Governor's Proposals for Relief of Famine.*—On the 12th November, after further communication with the local officers, the Lieutenant-Governor reported that the rabi would probably be only a half crop at best, and might be worse. “In North Behar the present failure would appear to be nearly as bad as that of 1873.” But, on the other hand, the bhadoi crops had been very good, the area of failure was smaller than in 1873, prices were lower, grain dealers more active, crops in the surrounding tracts better, and the stocks in the country larger. The Lieutenant-Governor believed that 300,000 tons would have to be imported for food, about a third of which would be wanted in the more remote parts of North Behar; and that private trade would probably effect this if aided by a railway. Accordingly, he proposed to construct four lines of temporary railway, aggregating 122 miles in length, to lower freights on food-grain, as in 1873, and to establish a steam ferry across the Ganges. The latter proposal was sanctioned, and ultimately one of the railway lines, the branch to Mozaffarpur, was put in hand; but it was sanctioned as a permanent not a temporary undertaking, and on grounds of general expediency as a reproductive work, not especially for famine relief. But the other lines had not been planned or surveyed, nor was it clear that they would ultimately pay for their construction. The loss by rapid construction, *i.e.*, the excess cost if they should be put in hand at once as famine works, was calculated at 36½ lakhs of rupees; and on these grounds they were postponed till the necessity for them should become clearer. Moreover, the Government of India (November 25th) declined to approve the reduction of freight (which had cost Rs. 45,60,000 in 1874), without further and more precise information. They wished to know, in regard to each thana, the population and area, and “as complete a statement as possible of those leading facts on which the extent and pressure of the famine (if any) will depend, such as the character of—

“(a) the last winter harvest;

“(b) the last spring harvest;

“(c) the rain crops.

“The present estimated outturn and prospect of—

“(d) the coming winter crop;

“(e) the coming spring crop.

“The proportional extent to which the several harvests cover the cultivated area of the thana.

“The extent to which the produce of the different harvests, respectively, is supposed to feed the people. The actual prices on the latest date for which the information may be available when the report is submitted of—(1) common rice, (2) lesser millets, (3) Indian corn, at the head-quarters of each thana, with the corresponding prices on the same date in 1871, 1872, 1873, and 1874.

“The communications of, and carriage available in, the thana, the marts or other commercial centres from which, in the event of famine, it would naturally draw its supplies, and the facilities, or otherwise, that exist for drawing such supplies.

“The character of the population, high caste or low caste, rich or poor, purely agricultural or partly, and if so, in what proportion urban or artisan. The character of the proprietors, large landholders and wealthy, small and poor, absentees or unsympathetic with their people, or likely and able to support and aid them.

"The deliberate opinion of the local officers as to the present condition of the people, as to the extent to which the scarcity is likely to affect them, and as to the nature of remedial measures, if any, that are called for."

"But these purely local reports will necessarily lack, to a certain extent, completeness; they will be based on no common standard. One officer will rate the same degree of failure at a higher or lower figure than another; and to enable the Government of India to form a really just conception of the state of affairs, it seems desirable that a special officer of established ability and experience in such matters should be deputed to visit all the presumably threatened jurisdictions, and after personal inquiry and examination of the local reports above ordered, and conference with these several district officials, planters, and intelligent natives, to report fully his views on the state and prospect of the several tracts, together with all such additional facts as he may have elicited." In accordance with these instructions, two officers, Messrs. Geddes and MacDonnell, were deputed to make a joint inquiry and to report on the questions specified.

3. *Lower Estimate of the Area of Distress.*—On the 2nd December the Lieutenant-Governor summarising the information contained in a long official narrative, dated 30th November, sent up a much more encouraging report. Champaran and Saran, Gya and Purneah, Dinajpur and Rangpur, were now altogether removed from the famine area: the only parts regarding which anxiety need now be felt were* two Sub-divisions of Durbhanga, two of Muzaffarpur, and one of Bhagalpur, with a population of 2,400,000. In these the outturn of the rice crop was now considered to vary from four annas in Madhobani to eight annas in Durbhanga, and the rabi prospects were much better than they had been.

4. *Mr. MacDonnell's detailed Calculations as to the Loss of the Crops.*—On the 7th December, the Government of Bengal submitted notes prepared by Mr. MacDonnell on the food-supply of these five sub-divisions. In these he calculated on such data as are available in those parts, the ordinary outturn of crops, the outturn for the year 1875-76, and the ordinary consumption and export. His conclusions were as follow. In Durbhanga the injury done to the rice crop had not been severe, and the other crops were good; the food-supply was amply sufficient to provide for the requirements of the people with a considerable surplus for export. In Madhobani, the rice-crop was about one-third of the average, and the rabi would be about a half: at these rates the food-supply would be about 38 lakhs of maunds, and the food consumption, seed-grain, wastage, &c., about 48 lakhs, so that nearly a million maunds would have to be imported, provided the reserve stocks were maintained at about their usual height. In Muzaffarpur, the winter rice being calculated at a quarter, and the rabi at half, an average crop, the food-supply would be 41 lakhs of maunds against local requirements of 65 lakhs. In Sitamarhi, taking the winter rice at five-sixteenths, and the rabi at one-third, of an ordinary harvest, the sub-division would have for its food 44 lakhs of maunds, against requirements of 52 lakhs, and from 500,000 to a million maunds would require to be imported. In Supul the estimate was—winter rice a quarter, rabi half a crop; and the result would be a deficiency of about 8 lakhs of maunds. The forecast may be tabulated thus, Durbhanga being omitted as a tract about which no further anxiety need be anticipated:—

Sub-Division.	Estimate of Crop of 1875-76. 16 annas = average.			Anticipated outturn in lakhs of maunds.	Ordinary require- ments for food, Seed, and Wastage in lakhs of maunds.	Deficiency in lakhs of maunds.
	Bladoi.	Rice.	Rabi.			
Madhobani - -	16	5	8	38	48	10
Muzaffarpur - -	16	4	8	41	65	24
Sitamarhi - -	16	5	5	44	52	8
Supul - -	16	4	8	35	42	7

The deduction from these calculations appears to be that Mozuffarpur was the tract most seriously threatened, and that the total deficiency of food was about five million maunds, or about 140,000 tons of food; but the stocks in hand, aided by reduced consumption on the part of the people, would, no doubt, enable them to exist till the next harvest came in. At this time there was no import by private trade going on, nor would the low prices then current admit of any: rice was selling even then in the most distressed part of Madhobani at 22½ seers per rupee. But the Commissioner of Patna, Mr. Metcalfe, writing at the same time (9th December), gave an alarming account of the position which, he said, closely resembled that of 1866, when "the local officers took an optimist view of the effects of the drought upon local supplies. No steps were taken, and the result was that thousands died." Speaking of the normal condition of Tirhut, Champaran, and Saran, he said, "not only is the cultivation left with an area barely sufficient to raise the food he requires for his family, but in times of drought, having no margin of cultivation left, he is short of food, as the yield is below his requirements."

5. *Brighter anticipations in January 1876.*—The next report is contained in Sir R. Temple's minute of 25th January 1876. He said, that in every case the out turn of the winter rice was now considered to have been better than the original estimate, and he illustrated this by the following table:—

Sub-Division.	Estimate of Winter Rice Crop.		
	8th November.	2nd December.	25th January.
Madhobani - -	4	4	5
Darbhanga - -	6	8	9
Sitamarhi - -	2	5	7
Muzaffarpur - -	5	5	7
Supul - -	2	6	6

Prices also continued low all over Behar, and it was ascertained that in such districts as Saran, Champaran, Monghyr, and Gya, about which alarm had been felt, the harvest had been very little, if at all, below average.

6. *Commencement of relief measures.*—On the 24th January the Commissioner of Patna reported that he had found cases of distress in the Darbhanga District; the lower classes of labourers being pinched for want of their usual employment in harvesting; he had accordingly appointed 6 relief officers (natives) and opened relief-works in part of Madhobani: gratuitous relief was only to be given in grain, not money, to those unable to work. His instructions to the Relief Officers were that they were to call on "the patwari and gamashta of each village for a list of the labouring people who subsist entirely by labour, and who have in the present year neither crops nor harvest work to employ them; to make themselves personally acquainted with the houses of these people and their physical condition: and the day it was ascertained they had no longer any food or means to buy food, to send to head-quarters for instructions as to the relief-work to which the labourers were to be sent." Thus the idea of administering relief on the basis of personal knowledge of the applicants' condition was still, as in 1874, the accepted principle in Behar.

7. *Report by Messrs Geddes and MacDonnell.*—On the 24th January, Messrs. Geddes and MacDonnell, who had been deputed at the end of November to inspect the distressed tracts and collect and compare the information demanded by the Government of India (see paragraph 2) sent up their joint report. It is a production of great ability and of permanent value, not only as showing the frame of mind in which alarmist and sensational reports should be treated, but also on account of the information it gives as to the condition of the Behar ryot, and the historical sketch of the causes which led to his circumstances being so depressed that the slightest seasonal calamity made him an applicant to Government for relief from famine. The report can, however, be but briefly summarised here. They began by showing that while in Sitamarhi the loss of the rice crop had been Sporadic, in Madhobani and Supul it had been more widespread and general, especially in the strip along the Northern Frontier: and they calculated that the outturn of the rice-crop was represented by the figures 7, 5, and 6 annas (or sixteenths) of an average crop respectively. The winter rain so far had been good, and they estimated the coming rabi crop for those 3 sub-divisions at 10, 6, and 12 annas,

respectively. No other sub-division was distressed except these three. Their rabi crop estimates were in most places higher than those of the Collectors and local officers, especially in Sitamarhi: and in justification of this they say—

“In noting this subject we cannot help remembering, that in December 1873 the prospects of the rabi in Behar were reported on as unfavourably as Mr. Worsley reports on them now. Yet the result in almost every district then distressed was that the rabi harvest was in the end a favourable one, so much so as to materially modify the local officers' explanation as to grain requirements. The same anxiety as to grain prospects for the cold weather of 1865-66 proved to be similarly incorrect, so much so that the local officers then went to the other extreme of reckoning too much on the rabi.”

They also testify to the activity shown in utilising all means of irrigation both for the rice and the rabi, in sowing a larger area than usual with rabi, and in sowing extra crops like “chena” (a small millet) and potato, which made a material addition to the food-supply of the country.

“Having remarked on exertions to extend the rabi crop in certain parts of North Behar, I feel bound to add, as the result of universal testimony and my own observation, that there has been no sign of that relaxation in energy which some people predicted as the result of the relief measures of 1874. On the contrary, all persons of every shade of opinion have remarked on the exertions made by ryots to save their crops from drought as quite remarkable. Even the Tirhootea Brahmans, who are usually found fault with in such matters, have been commended this year. Every pond and hole was turned to account, and except in parts of Soopool, where the tanks had, unfortunately, not been well planned, the new tanks, which were started as relief-works in 1874, have proved very serviceable this year. The streams have for the most part been all but useless for irrigation, showing how severe the drought in the Terai has been, and how much the streams had been drawn on up above in Nepaul. But wherever baling from the streams was feasible it has been done, more especially in Sitamarhi and Soopool. In this respect Alapore and Jubdee showed less elasticity. At one place in Sitamarhi we came across rice-fields which had been saved, and rabi which had been started, by water that had been conducted in extemporised drains over at least two miles from the river channel. The Teljooga river, always largely utilized in this way, was last November and December one long series of bunds from the frontier as far down as opposite to Soopool town.”

Part of this activity was due to the stimulus afforded by energetic officials. Thus Mr. Metcalf writes:—

“In Sitamarhi the Assistant Magistrate, with very praiseworthy activity, turned out the labouring population along the banks of streams, and, by banking up the waters, irrigated large areas of land on which the villagers were not slow in sowing cold-weather crops.”

Applying all the available data as to cultivated area crop, and average outturn and consumption, Mr. MacDonnell calculated that there was an actual deficiency of food-supply for the year amounting to 24,000 tons in Sitamarhi, 29,000 in Madhobani, and 13,000 in Supul. To supply this he strongly recommended that Government should import at least 11,000 tons of food-grain into Madhobani. At the same time the Collector of Mozaffarpur called loudly for an expenditure of 11 lakhs of rupees in Sitamarhi, in the form of relief-works and advances to the cultivators. Mr. Geddes agreed with neither proposal. He argued that, excellent as Mr. MacDonnell's calculations were, they were, after all, but estimates based on very imperfect data, and that other verifications should also be attended to “prices, degree, and direction of popular anxiety, and other similar gauges of opinion, direct and indirect,”—such as grain robberies, quarrels over the crops, and petty thefts. As to prices, he showed that they were neither abnormally high nor excited, and that there were no indications of alarm among traders. Neither was there any increase of crime, such as ordinarily precedes a scarcity. He was satisfied that private trade, especially if facilitated by measures he proposed for improving roads, making temporary bridges, and improving the bad ferry and toll arrangements, would be sufficiently able to throw in the grain required. With regard to expenditure of money on relief, the report goes on to show, both officers concurring, that Mr. Worsley, the Collector of Muzaffarpur, advocated an expenditure of 4 lakhs in advances to about 12,000 cultivators and 6½ lakhs in relief-works to afford employment to 90,000 people, and about half a lakh of rupees in gratuitous charity. No other officers advocated an outlay of anything at all approaching this sum, and no adequate reasons had been adduced to support the proposal.

“I consider his estimate for Sitamarhi far too high. I am certain that it cannot be afforded with justice to other parts of Behar, not to say India. Not that this would be a sufficient reason for withholding the expenditure if so extensive disbursements were necessary in order to save life. But with all respect for Mr. Worsley, as an officer whom I know to be earnestly solicitous for his district, I submit that these measures are not necessary. And it is a legitimate means of verifying to refer to other parts of India which one knows and ask one's self ‘could the Government reasonably be asked to afford a similar measure of relief over every other tract in like condition to Sitamarhi.’

“I venture to predict that Mr. Worsley's good sense on mature reflection would answer ‘No.’ I certainly make that answer now unhesitatingly. The present year is nothing like 1874. This year

the serious deficiency or absolute failure measures itself by occasional patches, not as in 1874 by *pargunnahs*. If one answers 'Yes' to the test question just proposed, one must be prepared to advocate expenditure on the scale of lakhs of rupees every other year up and down the Peninsula. Suppose, for a moment, we could, like the magician of the Arabian Nights, transport Sitamarhi with its crops, recont and prospective, and its existing resources,—suppose we could plant all this down in South Gya, South Shahabad, in Orissa, or further south. The new neighbours, on opening their eyes on Sitamarhi, and seeing the variety of crop, the extensive *rabi*, the frequent *rahur*, the not infrequent *sugarcane*, the numerous roads everywhere, would certainly think the Sitamarhi population much favoured above themselves in getting 40,000% in loans to agriculturists at only 6 per cent. interest, while some 40,000% is already outstanding at no interest, 65,000% in wages to labourers, and nevertheless only 3,600% in charity."

The condition of the ryots was no doubt extremely bad; but this, in a most interesting section of the report, Messrs. Geddes and MacDonnell went on to show was due to the peculiar tenures and customs of the country, to the infamous rack-renting, to the monstrous perversion of the law of distraint, and to the short leases given to middlemen by large landowners. If any relief were needed by the ryots in consequence of the state into which they had been brought, it should be given mainly at the expense of the rack-renters who were the guilty cause of it. A large part of the distressed area belonged to the Darbhanga Raj, the estate of a minor which was managed, and as shown in the report very ill-managed, by a military officer under the orders of Government; here they suggested large reforms of administrative system, a great reduction of rents all round, a temporary suspension of rent-collection in the parts where there had been extensive failure, and liberality in relief so as to set an example to other zemindars. Lastly, they recommend that the outstanding balances of advances made in 1874 should not for the present be collected, and that employment should be offered to the distressed by opening relief-works on a moderate scale, especially in Madhobani.

8. *Conclusions drawn from the Report.*—This report was forwarded with a minute of the Lieutenant-Governor, dated 3rd February, which dwelt mainly on the questions it had raised as to landed tenures, the relations of classes, the danger of agrarian disturbances, and the necessity of a change both in the law, and the administration of the law. With these questions, important as they are, the present sketch is not concerned to deal. The Government of India, replying on the 12th April observed with satisfaction that the probability of distress had at first been considerably overrated, that the application¹ for a large expenditure in Sitamarhi had been disposed of by the arguments used by Messrs. Geddes and MacDonnell, while Mr. MacDonnell's opinion as to the necessity of Government importation had been proved enormous by the events, since at the time of writing, no scarcity of food existed, and food-grains were selling at from 35 to 40 seers per rupee, a much lower price than at the same time in the previous year. It is stated² that the amount by which Mr. MacDonnell estimated the food-supply of Madhobani to be deficient, 29,000 tons, was actually imported by private trade alone.

9. *Summary of results and cost of relief measures.*—It only remains to gather up the scattered records which show the nature and cost of the relief measures which were carried on from the time they were commenced by the Commissioner's orders in January, till the distress was officially declared to be closed in the end of August. They were very limited in extent. In Muzaffarpur it appears that, notwithstanding the immense estimates made by the Collector for the relief of Sitamarhi, nothing whatever was done beyond the entertaining of three special officers. In Darbhanga relief was partly carried on at the expense of Government, partly at the expense of the Raja, in villages belonging to that estate. At the end of May there were 7,783 persons on gratuitous relief, and 6,500 were employed on small relief-works, village roads and tanks. In July the number in receipt of gratuitous relief, was 11,151 and the number employed on works was 9,017. After this the numbers appear to have fallen rapidly and the relief-works were closed on the 15th August. The total cost was about Rs. 31,000 to Government

¹ Mr. Worley's reply to the Famine Commission shows that he entirely agreed in this:—

"In 1874, Seetamarhee Sub-division suffered famine from failures of harvests scarcely more extensive than the failures which occurred in 1875-76. In the latter year, owing to large importations of food (some 15 lakhs of mounds being imported to the district), very low prices and an excellent mango season, the people of Seetamarhee Sub-division managed to support themselves without any assistance from the Government. In 1875-76 the outturns of the three harvests in that sub-division were *bhadai* 8 annas, *aghani* 5 annas, and *rabi* 8 annas. The outturn of the *aghani* harvest was ascertained by a village to village enquiry made by selected native officers and by myself. On 15th December 1875, I estimated that 152,300 persons of the agricultural and labouring classes would require assistance for three or four months in 1876, and that 5,000 paupers would require charitable relief; but as I have already stated, a combination of favourable circumstances subsequently upset all my calculations."

² Mr. Finucane. Reply to Famine Commission.

and about Rs. 1,33,000 to the estate of the Darbhanga Raj. It fell under the following heads¹ :—

	Rs.
Establishment - - - - -	12,593
Cost of grain (gratuitous) - - - - -	65,539
Miscellaneous - - - - -	2,375
Cost of relief-works - - - - -	83,701
Total - - - - -	<u>1,64,208</u>

10. *Lesson taught by the narrative of this scarcity.*—The lesson mainly to be learnt from this narrative is the importance of agricultural knowledge and the danger of an erroneous forecast. It is impossible to conceive anything more absolutely incorrect than the information on which Sir R. Temple, basing his warning letter of November 8th, asked for the commencement of relief measures which would have probably cost the State more than a million of money. Entire districts, which were then declared to be severely affected, turned out ultimately to have a harvest nearly equal to the average. Even in the small residuum of territory in which some loss of crop did ensue, prices continued throughout to be more than usually easy; and the officer who had asked with vehement insistence for leave to spend 110,000 on relief, actually found no occasion to spend a penny. There are three causes to which these mistakes seem mainly attributable. One is the alarmist frame of mind in which the local officers had been left by the lavish expenditure of 1874, and their relaxed attitude as regards the economical treatment of public funds. The second is their want of practical agricultural knowledge, and their readiness to believe that the slightest seasonal irregularity would ruin the winter rice crop. The third and most important cause (for to it the second, and to some extent the first cause also were mainly due) is the want of a field survey and of accurate statistical knowledge of areas, of crops, of tenures, of numbers, of all the facts which go to make up an understanding of the great industry of the country. And the report by Messrs. Geddes and MacDonnell shows that this want of accurate knowledge is not only responsible for ignorance when scarcity is or is not impending, but it is also the main factor in the administrative ignorance and mismanagement which have permitted class to be set against class, and the once prosperous Behar ryot to become one of the most depressed and miserable classes in British India.

12th August 1879.

C. A. E.

FAMINE OF 1876-77.

BOMBAY.

[MATERIALS: Three notes on the general policy of the Governments, &c., by General Sir M. Kennedy, dated 18th December 1876, and 28th April 1877, and by Colonel Merriman, dated 22nd December 1877 (referred to as K. I, K. II, or M.); closing Minute by His Excellency Sir R. Temple, dated 24th December 1877 (T.); Minute by Honourable Mr. Gibbs, 29th December 1877 (G.); Weekly Progress Reports by the Bombay Government; Official Records of the Famine Department of the Government of India (F. B.); Parliamentary Blue-Book on the Famine of 1876-77 (B.B.); and replies sent to the Famine Commission and evidence taken by them.]

1. *Causes of the Famine.*—The season of 1875 had been an average one. The monsoon of 1876 opened at about the usual time, but the rain fell scantily and irregularly up to the end of August, and then ceased prematurely,² hardly any falling in September or October; the consequence of this was a very general failure of the kharif, and inability to sow the rabi crop through the dryness of the soil. The following table³

¹ Bengal reply (Mr. Toynbee) to Famine Commission, page 17.

² K. I. para. 3.

³ Meteorol. Reports, 1876 and 1877.

shows the monthly figures, gauged in the rainy months of 1876 and 1877, as compared with the average rainfall of those months :—

District.	June.		July.		August.		September.		October.		Total of 5 Months.		June.	July.	August.	Sept.	Oct.	
	1876.	Average.	1876.	Average.	1876.	Average.	1876.	Average.	1876.	Average.	1876.	Average.	1877.	1877.	1877.	1877.	1877.	
Khandesh (Dhulia)	3.39	3.93	3.64	3.39	2.80	3.25	9.70	2.85	—	1.52	12.93	15.69	3.46	2.69	10.22	1.99	1.40	
Nasik	1.54	5.62	9.52	6.66	5.65	5.03	0.80	3.53	—	2.08	17.51	24.92	4.42	2.93	1.27	5.89	4.18	
Ahmednagar	3.24	5.12	12.30	3.03	1.23	1.03	1.82	6.23	0.09	2.57	8.73	12.41	9.93	0.43	3.63	4.51	2.71	
Poona	3.94	5.90	6.05	6.65	3.13	4.30	1.14	5.10	0.73	2.01	15.03	12.56	8.35	1.42	1.33	4.69	3.93	
Sholapur	2.03	4.49	9.05	4.15	3.60	5.03	0.54	6.00	0.28	3.35	8.31	23.16	8.40	3.78	3.73	10.56	3.70	
Satara	4.72	7.74	24.39	12.76	4.13	7.42	0.32	4.00	—	3.50	33.50	35.53	4.11	4.30	4.66	8.41	6.42	
Kaladgi (Bijapore)	2.13	1.07	0.59	1.88	0.23	3.96	0.74	4.90	—	3.53	3.71	13.39	4.98	2.21	4.23	13.78	8.77	
Belgaum	5.35	9.79	21.11	14.63	2.25	8.79	1.91	3.35	0.97	4.49	31.02	41.05	16.43	3.12	7.69	6.63	7.42	
Dharwar	1.53	5.65	7	5.73	0.81	5.05	0.53	3.27	0.40	5.77	10.32	25.52	4.89	0.76	3.15	10.93	8.53	
Total	30.13	32.43	78.96	53.97	23.93	47.61	8.53	33.49	2.45	32.97								
Percentage difference	-12		+30		-50		-77		-93									

From the figures it appears that the failure in the Kaladgi district was far the most intense, Sholapur, Dharwar and Ahmednagar coming next in order: Khandesh, Nasik and Poona had fair average rains till the end of August, but after that month their supply was very short. Satara and Belgaum had an excessively heavy downpour in July, and very little after that time.

2. *The first alarm.*—The first alarm was given by the Collectors of Khandesh and Sholapur in the end of August, and relief-works were opened in those districts early in September, but the rain of September, though it registered a trifling amount, seems to have fallen very favourably in Khandesh¹ and materially improved the position of that district. In the course of September, it became apparent that famine was impending in all the southern districts, and the first council of the Bombay Government was held on the 12th October.² The following principles were then laid down as to the administration of relief:—

(1.) That Government should not become a purchaser of grain, but should trust to private trade doing all that is needful.

(2.) That, wherever practicable, persons requiring assistance should be employed on relief-works of considerable magnitude, such as had been well examined and approved, and which would eventually prove useful; while isolated works of a trifling nature should, as far as possible form exceptions to this rule.

(3.) That each Collector should be granted Rs. 25,000 for preserving the lives of those who were too infirm to work.

3. *Dispute as to the principle of opening large works.*—At this time there existed, and continued for about two months, an unfortunate difference between the Government of Bombay and the Supreme Government, in respect to the character of the relief-works that should be adopted. The Government of Bombay advocated the commencement of large works, especially of the Dhond-Man-mar Railway, and some of the important irrigation schemes which have been prepared by Colonel Fife. The Government of India discouraged these and upheld the system of opening small and scattered works, which should not involve the Government in a large expenditure, provided the anticipated famine should not turn out to be very severe. "It is an established principle that those works should be selected, as far as practicable, which can be completed, or far advanced towards completion, by the outlay which the scarcity demands."³ Judged by this test, the railway, the Nira canal, and a road down the Amba ghât to the Konkan, could not be sanctioned, but tank clearances and repairs of roads were looked on favourably, and the sentiment was approved that it was inexpedient to collect large gangs away from their homes on large works. Special attention was drawn to the Resolution of February 13th, 1875 (winding up the Bengal Famine of 1874), and particularly to those paragraphs which bore on the propriety of obtaining complete reports and forecasts from the distressed area, of strengthening the district establishments, of watching the supply of food, and, in the last resource, of importing it from a distance, and of lowering the railway freight for food-grains. The Bombay Government postponed the railway, but persevered in their demand for the initiation of large and remunerative undertakings, in preference to small relief-works scattered over the country; and acting on the discretion given them, started several of these larger works on their own authority, "feeling sure" that when the subject had been more fully considered, their action would be approved, "and it would be admitted that they could not have acted otherwise without incurring

¹ K. I, para. 4.

² G. para. 4.

³ F. B., 25th October 1876.

"a very grave responsibility, or possibly endangering the lives of Her Majesty's subjects." After the matter had been discussed for some time, the Viceroy accompanied by Sir J. Strachey visited Bombay in December 1876, and the action of that Government, together with the principles on which it was based, was entirely approved and sanctioned.

4. *Earliest estimate of the extent of distress.*—The first estimate² made of the requirements of future relief was (in the middle of October) that about 500,000 persons would require support for a period of about eight months. In November, the extent of the area affected by drought was more accurately known. It was ascertained that the distress would be confined to nine districts, with a population of eight millions. Of the ninety-one talukas these districts contained, in twenty-one the failure was almost entire, and in fifty-nine more it exceeded half the usual crop. Sholapur, Kaladgi, and Dharwar were the worst districts, then Belgaum and Poona; in Ahmednagar some talukas were well, and some ill off; in Khandesh and Nasik the loss was about a half, and Satara had suffered least of all. It was estimated that about a million of people, or 20 per cent. of the entire population, would at the worst season come on the hands of Government, and that 1.40 lakhs of rupees would be expended on relief, while 66 lakhs of land-revenue would have to be remitted.³ Prices had gone up very suddenly in October, when the alarm first became general (millet rising to 10 lbs. per rupee in Kaladgi, and 14 lbs. in Sholapur), but they steadied, and fell again in November and December, when a large import trade set in. At the end of December millet fetched 17½ lbs. per rupee in Kaladgi, about 20 lbs. in most of the other distressed districts, and 30 lbs. in Ahmednagar. The sum of Rs. 25,000 was placed with the Collectors of the seven worst districts to provide for the feeble and infirm poor and for indigent people incapable of performing work, but the reliance of the Government was mainly on relief-works, and at the end of December about 250,000 people were employed on these.

5. *Estimates of probable numbers on relief.*—Two other estimates were made of the number of persons likely to be on the hands of Government, besides that made by the Bombay Government in November: of these one was framed by Sir R. Temple in January, and one by the District officers in the reports called for by the Government of India and reviewed in February. They may be compared thus:—

	Bombay Government (November).	Sir R. Temple (January).	District officers (January).
December - - - -	200,000	—	—
January - - - -	—	—	—
February - - - -	150,000	—	—
March - - - -	750,000	540,000	677,500
April - - - -	—	—	—
May - - - -	1,000,000	870,000	863,220
June - - - -	—	—	—
July - - - -	300,000	340,000	509,370
August - - - -	—	—	—

The data for these calculations seem, however, to have been very slight; they ranged, according to the severity of the failure, and the individual views of the officers who framed them, from 2 to about 30 per cent. of the total population of the different talukas.

6. *Detailed estimate as to the extent of distress and fore-cast for the future.*—On the 30th November, the Government of India called for a complete report regarding the distressed districts, and specified the following details of information as necessary to present a complete picture of the present condition and forecast of the future.⁴

- A careful estimate of the amount (if any) of the crop which has been saved, calculated in annas, on the assumption of an average yield being represented by 12 annas: kharif and rabi should be shown separately. If there be any prospect of further sowings, it should be mentioned.
- An estimate as close as may at the time be practicable, of the amount of revenue to be remitted.
- Information as to the mortality, past and anticipated, among cattle and agricultural stock, the measures already adopted by Government and the people, their results, and suggestions for the future.

¹ K. I., para. 24.

² K. I., para. 17.

³ F. B., January 1877, p. 16.

⁴ F. B., p. 247.

- (d.) The nature of the water-supply, extent of its failure, further anticipated failure up to next rains, and remedial measures possible, if any.
- (e.) The course of prices weekly of each of the principal food-grains from October 1st up to the date of report in each case, and six years' averages.
- (f.) The local stocks, as far as ascertainable; the centres, railway stations, or otherwise, whence further supplies are being, or may be, drawn; and the probability of private enterprise being sufficient to maintain them; as also of a fall in prices owing to ample importation.
- (g.) The character of the population—whether high or low caste, poor or well-to-do, purely or only partly agricultural, and if the latter, in what proportion urban or artisan; also the character of the landholders—whether large, wealthy, able to aid their tenants and likely to do so, or the reverse.
- (h.) The movements of the people: how far emigration has taken place, and with what results (have the people bettered themselves, or merely gone elsewhere to starve, or are they returning), and whether further emigration is probable.
- (i.) The relief-works already started, their sufficiency or otherwise, and the further works which are considered practicable, arranged in the order of their necessity.
- (j.) The nature and amount of charitable relief given to travellers, and to the aged, infirm, &c., who are unable to work.
- (k.) The number of persons whom the Government has on its hands at date of report, for relief (1) by works, (2) by charitable measures, and the number roughly estimated which it is likely to have on its hands on March 1st, May 1st and July 1st.

Adding that the above information should be given for each taluka separately, and should be in the first instance prepared by the mamlatdars, the permission already given to place them on special duty being freely availed of for the purpose. The Assistant or Deputy Collector in charge should test, verify, or supplement the statements of each mamlatdar, and then submit *as his own*, and in his own language, a complete report for the taluka on the points indicated with full and free expression of his own opinions. Each taluka report should be passed on by the Collector with his remarks to the Commissioner, and by him similarly to the Bombay Government, who will forward it to this Department. No report of any taluka should be detained anywhere, because others have not come to hand, and the whole of the reports should have reached the Government of India by the 15th of January next.

These reports were received at various dates, between the 17th January and 12th February, and were reviewed by the Government of India on the 21st February.¹ Of the ninety-three sub-divisions of the nine affected districts, six had reaped a full average crop, and in twenty-four the harvest was above the average. The following table shows the detailed estimate, sixteen annas being taken as the measure of an average crop:—

DISTRICT.	TALUKAS IN WHICH THE CROP HAD BEEN.						Average outturn @ 16 to a taluka.	Actual outturn of crop.	Per cent. of actual to average.
	Over a half.	Half.	A third.	A quarter.	A sixth.	Nil.			
Khandesh - -	9	4	6	—	—	—	304	184	60·5
Nasik - - -	4	4	2	1	—	—	176	90	51·1
Ahmednagar - -	3	2	3	1	1	1	176	71	40·2
Poona - - -	—	3	2	1	—	2	128	39	30·2
Sholapur - - -	—	—	—	1	—	6	112	4	3·6
Satara - - -	7	1	1	1	1	—	176	110	62·3
Kaladgi - - -	—	—	—	1	1	6	128	6	5·2
Belgaum - - -	1	2	1	—	—	3	112	32	28·6
Dharwar - - -	—	1	3	2	2	3	176	37	21·6
Total - - -	24	17	18	8	5	21	1,488	573	38·5

The deduction from this was that in all the nine districts taken together the crop had been rather above a third of an average harvest; but putting aside the three districts, Khandesh, Nasik and Satara, in which the crop had been more than a half, the outturn in the remaining five districts was only 22·7 per cent., or less than a quarter crop, and in the two districts of Sholapur and Kaladgi it amounted to almost absolute failure. With regard to cattle, it was observed that they had been driven away in great masses to the ghâts, and other accessible pastures, and it was hoped that in this way the most valuable animals would be saved. The people too had emigrated in large numbers, amounting to about 670,000 or 13·5 per cent. of the whole population,² to the Nizam's territory, Berar, and the Western Ghâts. Prices were still very moderate, and had only reached what might be called famine rates (or less than 10 seers per rupee) in two or three districts.

¹ B. B. III, p. 198.

² A special census taken in the Indapur Taluka, Poona District, in November or December, found that out of 67,000 persons 40,300 had emigrated, taking with them 31,445 cattle out of a total number of 44,000 (Bombay Summary for week ending December 22nd).

7. *Relation of food-crop to food requirements.*—It is impossible in the existing state of agricultural statistics in Bombay to quantify these figures with any precision, so as to show what is the actual outturn of food-grain which the estimates represent, and what relation it bears to the food requirements of the country. The following however is offered as an attempt to make a rough approximation to the facts represented :—¹

	Ordinary area under food crop; average of 3 years 1873-76.	Ordinary outturn at 380 lbs. per acre.	Food-crop area of 1876-77.	Estimated ratio of actual to average crop.	Outturn at ratio of preceding column.
	Acres.	Mds.	Acres.		Mds.
Khandesh - - - -	1,423	6,760	1,516	60	4,056
Nasik - - - -	1,275	4,956	1,238	51	2,527
Ahmednagar - - -	2,353	11,180	1,715	40	4,472
Poona - - - -	1,533	7,284	933	30	2,185
Sholapur - - - -	1,821	8,652	650	4	259
Kaladgi - - - -	2,113	9,880	700	5	494
Satara - - - -	1,540	7,333	1,440	62	4,546
Belgaum - - - -	1,446	7,040	1,186	28	1,971
Dharwar - - - -	1,121	5,300	994	21	1,113
Total - - - -	14,625	69,465	10,372	31	21,623

	Mds.
The population of these districts, eight millions of people ordinarily require, at 5½ maunds per head per annum	- 46,000,000
Seed-grain - - - -	- 4,500,000
Cattle food - - - -	- 5,000,000
Wastage - - - -	- 3,500,000
Total	- 59,000,000

Applying to these districts the rate of produce per acre which has been estimated for the whole Presidency (and which is too high because these are among the poorest of its districts), the ordinary outturn of food-grain in the year would be 69,000,000 maunds, leaving a surplus of 10,000,000 maunds above the requirements of the people. In the year 1876-77 the first effect of the drought was to bring down the cultivated area by four million acres, or 30 per cent.; so that if the crop on the cultivated land had been an average one, the outturn would still have been only just enough for the food of the people; but when the further reduction in the outturn is taken into consideration, it is found that the total quantity of food produced is only 21,623,000 maunds, or hardly half the amount required for food alone. Thus the total loss to the agriculturists from the failure of this one food-crop was about 42 millions of maunds, or 1½ million tons, or about 10 millions sterling at ordinary prices. Assuming that the people would in the course of the famine (though not immediately) reduce their daily consumption of food to 1 lb. a day, or 4½ maunds per head per annum, and making a further allowance for deaths and emigration, the minimum estimate for human consumption would be about 35 million maunds, or nearly 13½ million maunds more than was actually produced. Adding in, for seed-grain and wastage, some 6 million maunds, the deficiency was 19,400,000 maunds, or nearly 700,000 tons. We know that the importation of food-grain by rail and sea was 434,000 tons, and the balance will be made up, if we assume that there were in reserve 266,000 tons of food-stock at the beginning of the famine, or about two month's consumption at ordinary rates.

8. *Area and population of the Famine Tract.*—With regard to the Native States comprised in the effected portion of the Bombay Presidency, it was impossible to obtain the same accurate information as to the character of the crop in each sub-division: but reports were received² showing that in Akalkote, Jath and Phaltan the failure had been almost as complete as in the adjoining Sholapur and Kaladgi districts; in Kolhapur and the Southern Mahratta States about half the area had suffered severely. Adding these

¹ In columns 2, 3, 4, and 6, three 0's omitted. The area cultivated, in columns 2 and 4, is taken from the Bombay Statement No. 17 H, which refers to Government Ryotwari lands—a proportionate quantity being added for Inam land paying quitrent as explained in my Note on Agricultural Statistics.

² B. B. III, p. 435.

to the British districts, the following table shows the total area and population of the affected tract, and of the parts most severely visited by famine :—

District.	TOTAL AFFECTED.		SEVERELY AFFECTED.	
	Area.	Population.	Area.	Population.
	Sq. miles.		Sq. miles.	
Khandesh - - - - -	10,162	1,028,642	5,500	646,944
Nasik - - - - -	8,113	722,252	2,000	250,000
Ahmednagar - - - - -	6,647	773,938	5,350	640,000
Poona - - - - -	5,099	907,235	2,500	318,601
Sholapur - - - - -	4,496	718,034	4,496	718,034
Satara - - - - -	4,988	1,061,022	2,682	461,000
Kaladgi - - - - -	5,695	816,037	5,695	816,037
Belgaum - - - - -	4,591	938,750	2,660	501,000
Dharwar - - - - -	4,564	988,037	3,000	630,000
Total British districts - - -	54,355	7,963,927	33,873	4,981,616
Native States - - - - -	9,703	2,073,066	4,804	847,848
GRAND TOTAL - - - - -	64,063	10,037,000	38,677	5,830,000

9. *Instructions to Sir R. Temple.*—On the 5th January the Government of India¹ appointed Sir R. Temple as their delegate, on a special mission to visit the Presidencies of Bombay and Madras, “for the purpose of inspecting the distressed districts, and communicating personally with the two Governments concerning the measures which are being carried out, and which will have to be carried out, for the relief of distress, and of offering for their consideration any suggestions which he may deem suitable.” The instructions given him form an important turning point in the history of famine administration, and may be briefly summarised thus.² While Government would spare no effort consistent with the resources of the State for the prevention of deaths from famine, and of extreme suffering, it would not attempt the task of preventing all suffering, and of giving general relief to the poorer classes of the community. “Even for an object of such paramount importance as the preservation of life, it is obvious that there are limits which are imposed upon us by the facts with which we have to deal.” It was essential to practise severe economy, and to declare that the task of saving life irrespective of cost is beyond the power of Government. It was however believed that efficient measures of relief were possible without disastrous expenditure. The first thing was to settle the principles on which relief should be given. There were then 1½ millions in receipt of relief in Madras, and 287,000 in Bombay; but the mere collection of enormous numbers was no proof of serious suffering. If relief-works are carried out on wrong principles; if labour be not strictly exacted; if proper supervision be wanting and people obtain wages for inadequate work, the numbers in receipt of relief become overwhelming, and the population becomes demoralised. With regard to the character of relief-works it was said that—³

Small local works which, if well supervised and selected, may be useful as a purely tentative measure before the probable character and extent of a threatened scarcity can be ascertained, become insufficient and unsuitable as soon as it is clear that there will be serious and widespread distress. Large works should then be undertaken where large gangs of labourers can be employed with adequate labour tests. These works must, whenever possible, be of a permanently useful and remunerative character, and in some cases it is easier and wiser to carry people to works than food to people. Those unfit for hard labour can be employed in poor-houses or on easy work near their homes.

The duty of non-interference with private trade was laid down as a leading principle; but it was pointed out that purchases by public tender for the supply of food to gangs of labourers were quite unobjectionable; that in certain localities at a distance from the railway, and from large markets, it might be requisite for Government to intervene by making purchases at the nearest local dépôt to which the trade will convey the grain; and that, in such cases, where trade is not active, the intervention of Government may tend to facilitate rather than discourage the importation of grain by giving confidence to the traders. Lastly, the opinion was expressed (in confirmation of which the Secretary of State's despatch of 25th November 1875 was quoted) that every province should, as

¹ B. B. II, p. 3.

² F. B., January 1877, pp. 33-9.

³ F. B., January 1877, p. 39.

far as practicable, be held responsible for meeting the cost of its own famines, and that the main portion of the cost of the public works which protect the country against famine and add greatly to its wealth, should be borne by the people protected and benefited, rather than by the general tax-payer. In his reply dated 15th March, the Secretary of State approved these instructions, and added the following remarks¹:—

The object of saving life is undoubtedly paramount to all other considerations. But it is essential that in pursuing this end your officers should sedulously guard against the danger of inducing the population to rely upon Government aid rather than upon their own industry and thrift. In the interests of the distressed population itself, as well as of the tax-payers generally, you are bound to adopt precautions against indolence or imposition, similar, so far as the circumstances of India will permit, to those with which in this country it has always been found necessary to protect the distribution of public relief from abuse.

10. *His first visit in January.*—Sir R. Temple travelled through the Bombay Presidency between the 8th and 12th January 1877, stopping at Nasik and Sholapur, and then passed on through Hyderabad to Madras. He recorded in three minutes his impressions regarding the state of things then existing, and his recommendations for the future. In his first minute² he showed that in Khandesh and Nasik there was no prospect of severe distress, though in some parts of these districts the loss had been considerable, but the crops were fair in many parts and were good in the neighbouring districts of Nimar and Berar. His next minute,³ on the southern districts, revealed a far more serious state of things. In Kaladgi and Sholapur the loss of crop had been almost absolute, only one-sixteenth of the usual harvest being saved. In half of Ahmednagar and Poona, and in one-third of Satara, Belgaum, and Dharwar, the crops had been totally or almost totally lost, while they had been poor in the remaining portions of those districts. Considerable stocks, however, were believed to be in existence, especially in Kaladgi and Dharwar. On all the relief-works it was agreed that very little attempt was made to enforce the completion of a sufficient task and that a large proportion of the people employed were not driven there by fear of immediate want. The physical condition of the people was good. Private charity was being largely but not wisely distributed at Ahmednagar and Sholapur; in the latter place, except the lame, blind and very aged, Sir R. Temple did not see any one who would be a fit recipient of State charity outside the works. There were no emaciated adults or famine-stricken children: indeed, among 1,700 children to whom the daily dole was distributed, he did not see one who was not “comparatively plump and well clad.” In his third minute,⁴ Sir R. Temple reviewed and summed up the results of his observations:—

The three striking features in the scarcity of the Bombay Presidency are:—

- (1.) The utter and entire failure of crop in the worst affected tracts, hardly admitting of even one anna yield out of sixteen annas (assumed food-crop) being expected.
- (2.) The extraordinary activity of private trade, supplying fully with grain the markets in large districts which had suffered total loss of a whole year's harvest.
- (3.) The comparative cheapness of prices in these districts, averaging from 20 to 24 lbs. the rupee for common food-grain.

The expenditure was estimated as likely to be about 1½ million sterling, or 150 lakhs of rupees, on the assumption that the number of persons on relief, which was then about 300,000, would rise to 950,000 in May, sinking again rapidly in July and August. The following were the details of the calculation⁵:—

	Rs.
January to March, 416,000 persons per month for 3 months at Rs. 3 per month	37,44,000
April to June, 705,000 persons for 3 months at Rs. 3 per month	- 63,45,000
July, 340,000 persons for 1 month at Rs. 3 per month	- 10,20,000
TOTAL	1,11,09,000
Add for charitable relief at 10 per cent. on the relief expenditure	- 11,00,000
Estimate on account of extra establishments and contingencies at 12 per cent. on relief-works outlay, say	- 13,00,000
Add estimated total of expenditure up to the end of December 1876	- 14,00,000
TOTAL	1,49,09,000
Or	- £1,490,000
Or say 1½ millions sterling.	

¹ B. B. II. p. 32.

² *Id.* II., p. 22, January 9.

³ B. B. II., January 12, p. 24.

⁴ *Id.* II., January 12, p. 27.

⁵ *Id.* p. 31.

But if the expenditure is to be kept within this limit, certain points seem to me to deserve special attention, namely,—

- (1.) The exaction of task-work upon all the lesser works under the district officers, upon most of which works I fear that it is not at present exacted in the same manner as it is upon the works under engineering authorities. The present work is thought to be not hard enough.
- (2.) The withholding of admission to the relief-works in the case of those persons who do not appear to be in a depressed condition. Most of the officers whom I consulted seem to think that a certain proportion of those now on the works are not in absolute want.
- (3.) The concentration, until at least the 1st April, of relief labourers, under the Civil as well as under the Engineering authorities, upon works of those larger descriptions which admit of professional supervision.
- (4.) Special caution in the admission to the relief-works of ryots and others whose names are registered as possessing tenures or under-tenures in land, as it is to be presumed that, for the present at least, such persons would either have some little store of grain or some means of raising money wherewith to buy food. I am informed that a certain, perhaps a considerable, number of these persons are already being employed on the works, and the necessity of this appears to me doubtful.
- (5.) Great care in admitting to charitable relief from State funds those who may be unable to work. I saw at Sholapur some thousands in receipt of organised and most praiseworthy private charity, among whom were great numbers that were not in such extremity as to render them absolutely eligible for charitable relief at the public expense.

In a subsequent minute, January 24th, he expressed more strongly¹ his fears that, on many of the petty village-works, people could obtain, for the asking, and in return for next to no work at all, wages in money or grain; and he recommended that many of those petty works should be discontinued, at least for the present.

He further urged the importance of village inspection, and the necessity of strengthening the district establishment and appointing special officers for this purpose; since—

If the labour-tests are rigid, then it is always possible that individuals who, from one cause or other, are unable to answer those tests, may drop into dangerous distress. If then there be no village inspection, such persons might perish, but if there be village inspection they cannot perish, for their condition will be discovered, and they will be immediately brought up before the nearest relief authority.

Again, if the relief labourers are to be concentrated much more than at present upon works of larger description, the engineering establishment, both superior and subordinate, ought to be greatly and immediately strengthened. For instance, there are many small irrigation projects strongly recommended by the local authorities of the Deccan, upon the carrying out of which relief labour might be employed but which cannot be properly prosecuted for want of professional assistance.

He also strongly advocated the policy of suspending rather than of remitting the revenue; the Collectors expected that about 50 lakhs of rupees could not be realised during the year, but they agreed that if the next year gave a bumper crop, then much or most of this sum could be collected, and if two good years come in succession, all could be collected. "Four years ago in Poona, the Collector succeeded in collecting "all the land-revenue suspended in the preceding year."² To this subject, however, special reference will be made in a succeeding paragraph.

11. *Stricter management of relief-works.* The views thus expressed by Sir R. Temple as to the management of relief-works were entirely in accord with the views of the Government of Bombay, and with the plans they had formed for instituting large works under professional supervision. In some degree they had been thwarted by the unwillingness of the Government of India to sanction such large undertakings until fully satisfied that a famine was really impending and that measures on a great scale must be taken for the relief of the famine-stricken, and to this delay and the necessity they were under of opening a large number of small local works, they attributed the amount of disorganization which Sir R. Temple pointed out. The orders of the Bombay Government, issued 13th December 1876,³ had clearly laid down that it was not "the desire or intention of Government to render relief-works attractive," and it was feared even then that the large and increasing numbers of labourers indicated that they had been "rendered too attractive, either by the rate of wages earned upon them, or because for want of efficient superintendence or from other causes, a proper amount of labour had not been exacted from the persons who resort to them." Accordingly the wages of labourers were fixed as follows:—

For an adult male, one anna, plus the value of one pound of grain.

For an adult female, half an anna, plus the value of one pound of grain.

Working boy or girl, half an anna, plus the value of one pound of grain.

The Government had also called for estimates of the additional establishment required by each district. Again,⁴ referring to a remark by the Collector of Poona that small

¹ B. B. III., p. 26.

² *Ib.* IV., p. 1.

³ *Ib.* p. 26.

⁴ *Ib.* III., p. 32.

works in each village "would be more popular, because they would not take the people away from their homes," the Government observed that "at the present time there is nothing which more obviously requires to be checked than the popularity of the relief-works." "They did not, nor do they now, attach importance to the works on which able-bodied persons were to be employed, being close to their homes; but, on the contrary, regard this proximity as being a temptation to people who are not greatly in want to seek relief under circumstances where it may be found without much trouble or inconvenience to themselves." They had already and independently arrived at the conclusion embodied in Sir R. Temple's suggestion that the relief-wage mentioned above, being found sufficient for labourers doing a fair tale of work, must be too high for those who did little work, and decided on the 19th January that on Civil agency works, on which for want of professional supervision it was impossible to exact a full task, the wage should be reduced by half an anna in the case of men, and a quarter of an anna in the case of women and children. This was the first introduction of the "reduced wage," on the effects of which both here and in Madras so great a controversy subsequently arose.

12. *The strike of the labourers.* The immediate result of this was to very considerably reduce the numbers on the Civil Agency works. They fell from a daily average of 125,971 in January to 59,652 in February; while at the same time, though new large works were opened and efforts were made to induce the people to go to them, the numbers employed on them did not increase, but fell slightly from 191,000 to 183,000. The

	December.	January.	February.	March.
Ahmednagar	12,008	8,276	2,735	—
Sholapur	58,809	56,659	10,678	5,986
Poona	16,752	29,569	18,752	6,620

decrease on the Civil agency works was chiefly in Ahmednagar, Poona, and Sholapur, in which districts alone the numbers so employed had been large, and it was largest of all in Sholapur, where about 40,000 people went on strike sooner than submit to the severe discipline now introduced. A good deal of sympathy was elicited by this strike, under the impression that the labourers had been driven to take the step through harsh treatment, and that they would perish from want of relief; but the Bombay Government reported that only one death from starvation had occurred there, and that it would be very mischievous to yield to what evidently was the result of combination. The reduction, however, was watched with some anxiety, lest through any misunderstanding persons really in want should leave the relief-works and starve; and the Commissioner of the Southern Division issued the following orders to his Collector:—

When men leave the works, being disgusted, the overseer in charge of the works must *at once* send to the Assistant Commissioner in charge of the taluka the names of the people and their villages. The names will be sent to the respective village officers who should watch these persons and weekly report on their physical condition, taking care that no person is allowed through obstinacy to die of starvation. Of this the village officers will be held personally responsible. When these persons are really pressed by want they will, in all probability, repent and return to the works.

These orders were approved by the Bombay Government, who added the following remark²:—

It is quite impossible to fix any standard of physical capability applicable to all cases. A person who is apparently in good health and condition, who is not old, infirm, or affected with any physical defect, must be held to be capable, due allowance being made for a time for want of experience in the work assigned to him. In detail, the matter must be left to the judgment and intelligence of the local officers. The effect of the orders reducing wages and exacting more work should, of course, be closely watched. It is the object of Government, while opening relief-works to all who are really in need of assistance or are suffering, at the same time to take such precautions as are practicable to prevent any abuse of the charitable arrangement thus made.

13. *Discussion as to saving life at any cost.*—But on reading the instructions issued to Sir R. Temple, the Bombay Government conceived that they were opposed to the above order that no one was to be allowed to die of starvation through obstinacy, and a resolution issued on January 25th³ laid down that—

In the event of an individual refusing to perform work which he is capable of doing on the terms fixed by Government, no relief shall be afforded to him at the public expense during the continuance of such refusal.

The Government of India in reply explained⁴ more fully what had been meant by those instructions. They denied the reality of the dilemma, which was commonly

¹ B. B. III, p. 12.

² Resol. Jan. 18.

³ B. B. III, p. 30.

⁴ *Ib.*, p. 54.

supposed to exist, between allowing people to die of starvation and incurring expenditure which might bring ruin upon the country. "We say that human life shall be saved at any cost and effort;" and if it is asked what "the general principles are by which the district officers should be guided in refusing the aid needed to preserve life, the reply must be that there are no such principles, and that there are no circumstances in which such aid can be refused." But the order of the Government of Bombay, that no one should be allowed to die of starvation through obstinacy, "was approved, because the Governor General in Council does not believe that any one ever died of starvation through obstinacy, and no rules for dealing with such cases can be necessary." The Bombay Government rejoined¹ by expressing a fear that as a matter of fact people did die sometimes of starvation through obstinacy. The immediate effect of the reduction of the wage, the exaction of moderate tasks, and the transfer of able-bodied persons from the civil to the professional relief-works, had been that—

large numbers of people have left the works, declining to submit to the reduction of wages, or to perform the required tasks, or to accept the work tendered. There are other influences at work to sustain them in this movement, and the people are, many of them, voluntarily suffering great privations.

Some of those who are on strike are comparatively strong and robust, and able for a time to endure privation, but others are weakly; they appear to be acting in bodies and in concert, and the fear is that before the majority, who are comparatively strong, are brought to reason, some of the weakly will be reduced to a condition of great prostration. They wander about and may die out of reach of assistance. The Government therefore is placed in this dilemma—if they give way to the people, they cannot successfully carry out the policy of the Government of India, in which they concur, of strictly limiting expenditure, and if they do not give way, some deaths may occur. Feeling, therefore, that their rule has been approved by the Government of India, under what they cannot but hold to be too sanguine a view of the case, they will, until otherwise instructed, act upon the positive injunction contained in your 4th paragraph, that "no one shall die of starvation if it be in the power of Government to prevent it."

With regard to the men on strike in Sholapur, the Government of India entirely agreed² with the Government of Bombay as to the mischief of yielding to a strike which was attributed to combination. The result was that the numbers on relief-works in Sholapur rose again in April and May, but never reached the height they had attained in January. The following account gives the opinion formed at the time by Sir R. Temple as to the motives and the results of this strike³:

The number who discharged themselves from Government relief in the manner above described were about 102,000;⁴ they did, indeed, at first show signs of some method and system in their proceedings. They liked the village works with a lax system from which they had been discharged. They disliked the public works with a strict system, to which it was proposed to transfer them. They imagined that by throwing themselves suddenly out of employ they virtually offered a passive resistance to the orders of Government. Many of them endured more or less of inconvenience and privation in furtherance of a plan whereby they hoped ultimately to regain their position on the easy-going village works. For so favourable an object they deemed that some suffering might be borne. They counted somewhat on exciting the compassion of the authorities and still more on arousing fears lest some accidents to human life should occur. They wandered about in bands and crowds seeking for sympathy. They probably did meet with sympathy, indirectly at least, in various quarters. They certainly had leaders both from among their own body and from among the employes whose vacation had ceased from the contraction or cessation of the village works. Moreover, the village headmen (patels) are, as a class, much opposed to any system of relief-works which takes the people away from their homes. This feeling may be natural on their part, but it cannot receive attention when it militates against so important a principle as the application of a definite test to a relief system in time of famine.

The Local Government, however, did not yield, though it did report the matter to the Government of India, apparently with a view to strengthening the position by eliciting further authoritative declarations. The Government of India on two occasions declared in effect that undue concessions must not be made to combinations of work-people formed with sinister or self-interested objects, and that, although Government was bound to do its utmost to save people from death by starvation, it could not always undertake to save them from death owing to their own obstinacy or misconduct. These views have doubtless helped to guide the thoughts of the people, and to subside any unreasonable hopes which may have been engendered.

Of those who thus deserted the relief-works some returned to labour when they found resistance unavailing. But many, after wandering about for a short time, settled quietly in their own villages, where they still are (as I have myself seen them in several places) in a condition which, if not good, is yet not reduced. Of these it is thought many must ere long be constrained to apply for relief.

14. *Sir R. Temple's second visit in March.*—In the latter half of March Sir R. Temple again visited the famine districts of Bombay, on his return from Madras. In Sholapur the numbers on relief-works were lower by 45,000 than they had been in January, but the civil officers believed that the condition of the people in the villages was fairly good,

¹ B. B. III, p. 90.

² *Id.*, p. 91.

³ B. B. II, pp. 303-4.

⁴ *I.e.*, difference between 136,000 on the 12th January and 34,000 on 12th March as above stated.

⁵ B. B. III, p. 295.

and those on the works were certainly in a fair state of bodily health. Village inspection had been well organised : each taluka was divided into eight or ten circles with a relief inspector over each : a register of paupers was prepared in every village : and the infirm and bed-ridden were fed there in their homes, while others had to reside in the relief-house at the headquarters of the taluka. One Assistant Collector was in charge of each taluka. In Kaladgi¹ things were not so well managed : the number on relief-works was very small, and had decreased by a half since February, the decrease being due to a strict adherence to the practice of shifting the labourers from one work to another, and employing them only at a distance from their homes. It was believed that the people who had left the work were supporting themselves in one way or another at their homes, and that no one was dying of hunger in their villages ; but no organised system of village inspection existed corresponding to that in Sholapur. Among the labourers on relief-works and the inhabitants of some villages he visited Sir R. Temple found several emaciated persons. In Ahmednagar village-relief under Circle Inspectors was carried on in the worst talukas, and no starvation deaths had been reported, but the wages on Civil agency works were as low as 1 anna 1 pie for an adult male, and on the Dhond-Manmar line some very poor-looking gangs were found. In Poona large and concentrated relief-works were being successfully carried on, and it was said that those who had left the works in January and February had either emigrated to the Nizam's country or the Western Ghats with cattle, or had gone to Bombay for work ; and that very few of the ordinary residents now remained in the villages of the two worst talukas. The labourers on relief-works for the most part seemed in good case, especially those on the Mutha Canal where relief was earliest begun. No regular relief-houses had been established for the distribution of cooked food ; village lists of paupers had been drawn up, in accordance with which the patels gave to each person on the list an order on the village grain-dealer to deal him out a pound of grain a day, with an addition of one pice in cash per week. The district officers considered that this system worked well, and that no person had starved or were likely to starve in the villages. Taking a review of the whole Presidency, Sir R. Temple² expressed himself well satisfied with the administration of famine relief, and the only point in which he noticed any shortcoming was in respect of charitable relief and inspection of the villages. There were at that time about 42,000 persons in receipt of this form of relief, and he would have wished to see the number larger, though at the same time the reluctance of many of the destitute poor to resort to the poorhouse was due to a feeling of self-respect which was creditable to them.

15. *Subsequent history of the famine in 1877.*—The period of severe distress began about the end of March, by which time local stores had been to a great extent consumed, and the harvest operations were entirely over ; but at the end of April³ the number on relief was only 3·5 per cent. of the distressed population, instead of 20 per cent., as had been anticipated ; and it was clear that—

considering the extent and intensity of the crop failure, and the generally miserable condition of the country throughout the famine tract, the self-sustaining power of the people had been underrated, the private means of individuals under-calculated, and the willingness and ability of the richer persons to relieve and employ their poorer neighbours, had not been sufficiently appreciated.

The distress went on increasing in severity till the middle of June⁴ when the number on relief reached its maximum, 7·1 per cent. on the affected population. When the monsoon set in the number of laborers fell rapidly ; but though the rains began favorably in June, they failed almost entirely in July and August, and a second period of distress and apprehension began till the heavy downfall of September relieved all minds from their worst anxieties. It was during this period that prices stood highest, reaching the limit of 8½ pounds⁵ for a rupee in the Belgaum and Dharwar districts in August, and in Kaladgi in September, but about the middle of September they again began to fall.

In August the numbers on the hands of Government began to rise again, but, though the increase at this time under the head of gratuitous relief was large, they never reached the height attained in June. From the beginning of September, though the helpless poor did not diminish, the reduction in the number of laborers continued to bring the total number down, and after the middle of that month the reduction became general under all heads. The last laborers were discharged at the end of November and the relief-houses are being gradually, but rapidly, closed.

16. *Prolongation of distress in 1878 and 1879.* The closing minute by Sir R. Temple was written on the 24th December, 1877, in the belief that the famine was then at an

¹ B. B. III., p. 297.

⁴ M., para. 30.

² *Ib.* p. 303.

³ K. II., para. 41.

⁵ M., paras. 4 and 30.

end. There was however a revival of¹ distress in the spring of 1878, owing to the prevalence of high prices and to the poverty of the spring crop which suffered from the absence of the winter rains. This was still farther enhanced by the holding off of the summer rains in June and July, which caused considerable anxiety till they set in abundantly in August. The districts which suffered most were Kaladgi, Poona, Ahmednagar, and Nasik. Relief-works were started in March and suspended in September, they cost Rs. 288,455, and the value of the work done was 89 per cent. of the outlay. The highest number employed on one day, 13th July, was 19,544. Gratuitous relief was given at central poorhouses, the expenditure on which was Rs. 27,324, and the largest daily number relieved in this way was in the week ending 24th August, when 2,331 persons were fed. The misfortunes of this Presidency were not yet at an end. The autumn crop of 1878 and the spring crop of 1879 were both below average, especially in Guzerat and Katiawar, and a great portion of what was then produced was destroyed by an extraordinary plague of rats which infested the southern Deccan and South Mahratta districts: rewards were given for their extermination and over 12 millions have been destroyed. In April 1878 relief operations had again to be started and village inspection set on foot in the worst talukas. Two railways, the one to Kaladgi and the branch to Bhaunagar in Katiawar were begun, the latter employing as many as 18,000 labourers daily; in August the number of persons on all the relief-works in the first week of that month was 41,092. In the first week of September the number on gratuitous relief was 17,656. In the half-year ending on the 30th September, 1879, the outlay on relief-work was Rs. 609,000 and on gratuitous relief Rs. 130,000; the estimated expenditure under these two heads for the whole year ending 31st March, 1880, was Rs. 900,000 and Rs. 200,000 respectively.

17. *Principles of relief-works.* The principles which the Bombay Government laid down from the first for the guidance of its officers, and which the Supreme Government after a little hesitation accepted, have already been explained and are briefly summed up thus²—

I.—That as far as possible large, concentrated, and useful works should be undertaken.

II.—That checks and tests should be applied which would deter persons from seeking relief who were not in real need, and which would, as far as possible, prevent the abuse of public charity.

The classes of relief-works were two; those under Public Works officers and those under Civil agency.

T., paras. 23 and 24.—The works under Civil agency were of a petty description, consisting in some districts of cross-roads leading from one village to another, and in other districts of the excavation of village tanks. Though far from valueless, these little works would not claim any high degree of public value.

The works under the Public Works Department mainly consisted of projects of irrigation and of trunk roads. There were some people employed on our railway, the chord line from Dhond to Manmar: the numbers were at one time considerable, amounting to 30,000 daily.

The admission to these two kinds of works depended on the capability of the laborers, who were classified thus:—

K. II., para. 20.—Class 1st.—The able-bodied men and women, who should as a rule be drafted to the works, where there are any such within reach, under the Public Works Department, where the supervision is of a stricter and more effectual character, and where the value and quality of the work performed can be more correctly regulated and estimated.

Class 2nd.—The less capable, the older men, and the women and children, who may in larger proportions be employed on the works under the Collectors, where the supervision, though it may be less strict, should still be maintained as far as is compatible with the object of the works. The work-people should not be permitted to idle, and the work done should be regularly measured up, and its value calculated with reference to the expenditure incurred.

This rule was, however, relaxed in the case of members of the same family, who might be of different classes of strength. It was ordered therefore that, when able-bodied persons were employed on works, their families and immediate dependents, though not themselves able-bodied, should also be received, and these were generally put together in a separate gang on the work.

The effect of this classification of laborers and of the general adoption of the first of the two principles quoted above will be seen at once by a reference to the respective numbers employed on the two kinds of work, as given below in para. 21. While in December the numbers were nearly equal, and in January the Civil agency works were

¹ This para. is based on a minute by Col. Merriman of 1st November, 1879, received after the rest of the history had been written.

² K. II, para. 12.

not much behind the others, in May they had fallen so much that they employed only a tenth of the total number of laborers, and they continued in this proportion till September. By far the greatest part of the relief administered in Bombay, when the system was well established, was administered on these large relief-works.¹

18. *Tests: A low scale of wages.*—The “checks and tests” applied was mainly three: a low scale of wages, task-work, and the distance-test. The scale of wages finally adopted has been already stated. It was—

	Adult male.	Adult female.	Working Children.
Public Works Department	Value of 1 lb. of grain, plus 1 anna.	Value of 1 lb. of grain, plus $\frac{1}{2}$ anna.	Value of $\frac{1}{2}$ lb. of grain, plus $\frac{1}{2}$ anna.
Civil Agency Works	“	“	“

The grain was to be grain of medium quality of the cheapest variety: the price was to be the price at which the grain was purchasable at the Taluka head-quarters; fractions of a pound were to be given in the labourer's favour; when work was stopped by rain the Civil agency scale of wage was to be given; on Sundays no work was done and no wage paid, except when grain reached the price of nine pounds per rupee, in which case seven days' wages were to be paid in the week; a day's pay was to be given to labourers transferred to a work over ten miles distant; the non-working children of labourers were to receive $\frac{1}{2}$ anna a day; all cases of special weakness or emaciation, and also nursing-mothers, were to be treated specially, receiving additional wage or food at the discretion of the relief officer till such time as they had regained strength and could be classed with ordinary labourers. Wages were to be paid weekly or bi-weekly to ordinary labourers; in some cases daily payments might be necessary, but not as regards the mass of the labourers.² With respect to the working of these rules, it is universally agreed that the wage on the Public Works Department works was sufficient and the people thrived on it; and there is an almost general consent that the Civil agency wage was also sufficient. Sir R. Temple says on this point (paragraph 49)—³

Opinion was at first less confident in respect to Civil agency gangs; but, as experience was gained, these people also were found to continue in ordinary condition. These observations were further confirmed by the sanitary officers after inspection, and also by the Sanitary Commissioner. Later in the season it was thought desirable to collate all the evidence, including the most recent experience, on the subject. And it is now regarded in the Bombay Presidency by all concerned as an established fact that the scale is sufficient and ought not in justice to the public interests to be exceeded.

That a rate of wage so much lower than has ever been systematically given before in famine time should have been successful is probably due to the palliatives that accompanied it—the payment for infants, and the special treatment for the enfeebled. Of these Sir M. Kennedy prominently mentions the former as a most beneficial system. Sir R. Temple also draws attention to a third important requisite: “there is always one practical question to be considered,—whether the people receive the wages allowed to them:” and on the whole he claims that it is shown that no such abuses existed, on any considerable scale, as must always spring up where supervision is lax and organization imperfect.

19. *Task-work.*—The rules laid down on the subject of task-work were that on Public Works Department works the task should be fixed⁴—

at not less than 75 per cent., and on works under Civil agency at not less than 50 per cent. of the task that would be required from a labourer on full wages in ordinary times. And these words “the task that would be required from a labourer on full wages in ordinary times,” it was subsequently explained (Government Resolution Nos. 156—546 E., dated 10th March 1877), meant the task that the particular labourer, looking at his strength, condition, and skill, would be able to perform if he worked to the full extent of his ability.

Thus the orders were that labourers should be tasked not according to a fixed common standard, but according to the individual capacity of each, and that the tasks exacted should not be in proportion to the full capacity, but less by 25 or 50 per cent., according as the labourer was on a work under the Public Works Department, or on a work under Civil agency.

¹ Extracts from an account of the system adopted on the Gokak Canal, by Mr. Palliser the Executive Engineer in charge, will be found in the appendix: they contain some useful and interesting details.

² Fortnightly payments, however, were common, advances being given after three or four days to new arrivals. On the railway, people often had to borrow from a bania and repay the loan with interest when pay day came. In Kaladgi payments were at one time three weeks in arrears, the numbers on the works having increased suddenly and overwhelmed the establishment. See evidence of Messrs. Keyser, Candy, and Spry, and Reverend Mr. Harding, before Famine Commission.

³ See also summing up of evidence in my separate note on the “reduced wage.”

⁴ K. II, para. 29.

⁵ T. para. 50.—Dr. Hewlett, the Sanitary Commissioner, also postulates that the wage on the Civil agency works should be paid daily; but it appears that this was not generally done. (See Sanitary Report, 1877, p. 252.)

⁶ M. paras. 19 and 20.

An able-bodied labourer who did less than his appointed task might be paid only the proportionate value of the task he had done, however small that was; but non-able labourers might not be paid less than the Civil agency rates.¹ The effect of the strict enforcement of the task was at first to entail a considerable amount of fining. Thus Mr. Bernard wrote:²

"On all the great works which Sir R. Temple visited in the Poona District, most of the labourers had forfeited from a fourth to a sixth of their wages during the earlier weeks that task-work was imposed. But now all the gangs, with but very few exceptions, do their full task and get their full wage" (which was then 1 anna 10 pie). On the Dhond and Manmar Railway, "during the first ten days no deduction was made for short work: then deductions began and the men for about ten days earned a little more than half the full wage: during the last week they have been doing three-quarters of full work." On the Mutha Canal the wages were 1 anna 9 pie. "During February the deductions on account of short work came to 9 per cent. on the total wages: but in March 90 per cent. of the gangs have earned full wages."

20. *Piece-work*.—At the first opening of the relief-works some inclination was shewn towards payment by piece-work, and it was ordered that task-work should be introduced in such a way as "to enable the labourer to earn his daily rate of pay or more than that rate should he prefer to do so."³ But on further consideration this project was abandoned. In June 1877 the Government wrote as follows:⁴—

Piece-work at ordinary rates has been disallowed in Bombay on the principle that although the Government have determined to sustain the people in a manner that will secure, as far as possible, a commensurate return for the outlay incurred, and that will not demoralise the recipients of relief, yet they do not propose to expend a larger sum of the public money than is absolutely needed to secure the essential object aimed at; and they hold that if the extent of relief necessary to secure the substantial safety of the people be afforded any excess of the outlay needed for that purpose is not justifiable, even though it be ultimately represented by work which, though it may prove useful, would not have been undertaken in ordinary times and under normal conditions. If this view be correct as regards large and useful works undertaken for relief purposes, but carried out under strict discipline and by professional agency, it is, perhaps, especially so as regards the petty works usually performed in return for the lower rate of wages under Civil officers, and for the most part in and near villages.

21. *The distance-test*.—It was found, however, that a low rate of wages, combined with a moderate task, was not by itself a sufficient test; people would seek employment on almost any wage, provided the works were not far distant and they could return to their homes at night.⁵ The only check which, when combined with the above two tests, could be trusted effectually to keep off people who were not really in need of relief was that they should take some trouble in seeking for it. The Collector of Ahmednagar first suggested this step, by giving orders that when villagers who were believed to be well-to-do were at work close to their homes they should be sent to some more distant work. The Bombay Government adopted this plan and made it a general rule: on the Dhond and Manmar Railway it was particularly enjoined that persons who lived so near the line that they could return home at night should not be employed in that part of the work, but be sent to some other parts, at least 10 miles off their homes.⁶ It was, however, added that the principles should be applied not rigidly but with discretion; and that "it might be relaxed in all cases where there was good and clear reason for relaxation." Sir R. Temple says of this test⁷—

If people are not severely distressed they will not comply: the fact of their complying is the best proof of their being so distressed. But it has this unavoidable disadvantage, that it cannot be applied all the year round. From November to June (in the Bombay Presidency) there is no chance of any useful rain coming: the season is open, the sky clear, the ground dry and salubrious. For these seven months the people can be marched about as the authorities deem fit; and their employment on good public works is comparatively easy. But from June to November these conditions are reversed; although drought may be prevailing, yet rain may come at any moment, causing agriculture to revive and demanding the presence of the people in the fields: the skies are fitful, the ground too damp for encamping, consequently the people cannot be kept at a distance from their homes, and their employment on good public works is extremely difficult. If then distress breaks out at any time between June and November, or even in May, just before the rains are expected, the due control of relief labourers becomes difficult or impossible. The authorities are obliged to temporize with these poor people and to suffer them to work near at home till "the open season arrives, when a better organization can be employed. Until then an inferior control has unavoidably to be tolerated. This was the case in the Kaladgi district, especially when there was a serious augmentation of distress in July and August, and also in parts of the Belgaum district.

22. *Nature and value of the relief-works*.—The large works carried out were either canals, tanks, or roads. The most important of the former class were the Mutha, Nira, and Gokak canals: the Mutha runs past Poona, supplying water to the town and cantonment, as well as to the rich garden cultivation round the town and to a long strip

¹ M., para. 21.² B. B. III., p. 300, 24th March.³ M., para. 19.⁴ F. B., p. 857.⁵ K. II, para. 23.⁶ M., paras. 23, 24.⁷ T., para. 42.

of land to the east of it; the Nira is constructed to water the drought-stricken taluka of Indapur; and Gokak is in the Belgaum District. It was fortunate for the Presidency that the former Chief Engineer, Colonel Fife, had given so much attention to works of irrigation, and that the plans and estimates of many such projects, prepared under his orders, were ready for immediate adoption, especially in the Districts of Poona, Sholapur, and Satara. The roads, though some were important, were a less useful class of work, and several of them were left unfinished when the famine closed. They were mostly designed to connect the eastern and outlying portions of Kaladgi and the South Deccan with the Great Indian Peninsula Railway, and with the passes which lead down the passes through the Western Ghâts to the Konkan: their total length was about 3,130 miles.¹ The following statement² gives some particulars as to the nature of the canals and tanks and the relief afforded by them:—

District.	Name of canal or tank.	Highest number of relief labourers employed on it.	Approximate area of tank in acres.	Approximate area under command in acres.	Length of canal or main channels in miles.	Expenditure during the famine in rupees.
Khandesh	Mhaswa tank	670	421	2,060	6	38,000
Ahmednagar	Ojhar canal extension	3,500	—	17,528	9	31,000
	Mutha canal	18,155	3,681	105,812	70	2,51,000
	Nira canal	16,789	—	279,680	129	3,94,000
Poona	Matoba tank	6,420	477	12,412	20	1,73,000
	Shirsophal tank	3,943	834	10,000	15	1,16,000
	Bhadalwadi tank	986	336	2,900	15	7,000
Sholapur	Ashti tank	17,179	2,677	13,324	29	3,22,000
	Pangaon tank	9,943	6,702	60,000	80	1,34,000
	Nehr tank	16,836	675	12,800	17	2,92,000
Satara	Mhaswad tank	15,651	4,014	90,000	31	4,06,000
	Pingli tank	10,374	349	4,100	11	2,76,000
Belgaum	Gokak canal	11,946	—	77,319	52	2,17,000
	Gaddikeri tank	1,231	136	450	2	18,000
	Dambal tank	1,897	421	1,790	2	57,000
Dharwar	Medleri tank	1,129	169	1,916	10	26,000
	Hirekernur tank	1,001	567	562	2	18,000
	Rambennur tank	903	268	174	2	24,000
		—	21,727	692,827	502	28,00,000

The total area of all the tanks may be set down at 21,727 acres, the total length of the canals and main channels at about 502 miles, and the total extent of lands irrigable at about 692,827 acres. The works, however, are not complete, though they may be described as being in various stages of completion. Even in their present state, however, a few of them will afford some useful irrigation. The total expense incurred during the famine on these irrigation works may be set down at Rs. 28,00,000 or £280,000; and the expenditure required to complete them may be estimated at about Rs. 63,00,000 or £630,000.

In spite of the excellence of the organization and discipline on these works, it was necessarily to be expected that work done by relief labourers, most of whom are unskilled and many of whom are weakly, would be more expensive than that done by labourers in ordinary times. In no past famine, however, has the extra cost of labour been so little, or the toil of the labourers so well utilised. This will be apparent from the following statement drawn up by the Examiner of Public Works Accounts³—

	Value of work done.	Extra cost charged to Famine.	Total.
	Rs.	Rs.	Rs.
Roads and miscellaneous	51,99,000	18,34,000	70,33,000
Irrigation-works	20,65,000	13,64,000	34,29,000
Dhond-Manmar Railway	8,50,000	20,00,000	50,000
Local works, extra cost only	—	55,000	—
Total	81,14,000	34,53,000	1,15,67,000

¹ T., para. 26.

² T., para 30.

³ Colonel G. J. Melliss' evidence before Famine Commission.—These figures do not agree with those in Sir R. Temple's minute, as these show the expenditure up to 31st March 1878, while his figures run only up to December 1877. According to his minute (paragraph 36) the expenditure on irrigation works was 28 lakhs, on roads 55 lakhs, on petty works 10 lakhs, total 93 lakhs of rupees.

Of the total amount expended, 70 per cent. was met by the value received and only 30 per cent. was the additional cost of relief. The greater part of this amount has been classified thus, under the main heads of expenditure :—

	Roads. Rs.	Irrigation. Rs.
Materials - - - -	2,40,000	1,90,000
Skilled labour - - -	1,75,000	1,25,000
Unskilled labour - -	56,80,000	19,25,000
Supervision - - - -	3,35,000	1,30,000

so that out of this sum of 87 lakhs, 76 lakhs, or 88 per cent., was expended on the support of the class of labourers for whom relief-works are specially intended.

23. *Numbers employed on relief-works.*—The total number of labourers employed on relief-works was as follows :—¹

	PUBLIC WORKS DEPARTMENT.			Civil Agency.	TOTAL.	Infants.
	Roads.	Irrigation-works.	TOTAL.			
1.	2.	3.	4.	5.	6.	7.
November - - - -	60,622	16,564	60,923	33,914	96,837	—
December - - - -	117,582	37,937	147,234	110,095	257,329	—
January - - - -	142,655	43,852	191,893	125,971	317,864	15,824
February - - - -	120,269	56,517	183,626	59,652	243,278	41,737
March - - - -	126,338	64,257	199,922	28,592	228,514	49,365
April - - - -	153,712	88,160	255,691	30,489	286,180	76,341
May - - - -	193,970	111,322	328,646	32,703	361,349	106,309
June - - - -	194,890	117,447	323,394	36,262	359,656	111,050
July - - - -	162,699	78,654	239,725	23,561	263,286	80,193
August - - - -	184,040	64,612	246,539	27,803	274,342	80,112
September - - - -	160,415	53,274	198,046	24,848	222,894	64,637
October - - - -	36,442	31,498	68,298	16,150	84,448	43,949
November - - - -	4,446	8,801	19,298	3,429	22,727	19,600
Total - - -	1,668,080	772,895	2,463,235	555,169	3,018,701	689,117

with the proviso that it was not intended to make them absolutely binding in every instance and in every district.¹ According to these rules, the Patels and Kulkarnis were to prepare lists for their villages, showing (a) those who were blind, infirm, and maimed so as to be unable to work, and orphan children; (b) pardanashin women and widows or deserted wives with small children; (c) those who, though unable to do out-of-door work, are still able to perform light labour at relief-houses. Of these the first two classes might receive relief at home and the third class, as well as all persons found wandering about in an emaciated state, were to be sent to the relief-houses, of which one was to be constructed at the head-quarters of every district and taluka, with branch ones in the taluka if necessary. At these relief-houses residence does not appear to have been enforced,² cooked food was given at them (1 lb. 2 oz. to a man, 12 oz. to a woman and 6 oz. to a child under ten) once a day and such work exacted as was practicable, e.g., cotton-spinning, rope-making, corn-grinding, and all the service of the place. Each pardanashin woman was given a basket containing 14 oz. of cotton to spin with and money for a week's food at the relief-house rate; at the end of the seven days if she delivered up the spun thread, she received a fresh basket and another week's supply. Gratuitous relief was never administered at home to any save those who from sickness or infirmity were unable to move.³

25. *Village Inspection*.—This rule could only be effectually worked on the assumption that the villages were frequently and thoroughly visited, and all cases of distress hunted up. Early in November the village patels were warned of their duty to give immediate assistance to travellers in want, and to report all cases of distress in their village; a complete system of circle inspectors and taluk relief officers was organized in March, and in April the Government expressed its belief that the village system "is now worked so well by means of the chain of supervision that has been established, that no unusual occurrence could anywhere take place without Government being immediately informed of it."⁴ There is no information on record as to the strength of the special establishment entertained for this purpose, but Sir Richard Temple stated⁵ that it was nearly as strong as that employed in Bengal in the famine of 1874. The relief officers and other Government servants, and the headmen and other office bearers in the village, were enjoined⁶ to search for and bring forward all persons who appeared to be in danger from want.

The force of language could not make these injunctions stronger than they were. The distressed districts were parcelled out into moderately-sized circles of inspection for the particular purpose. Over each circle was placed a special inspector. Much depended, of course, on the watchfulness of the village headmen, and accordingly they did much, partly of their own free will, and partly from the pressure put on them by relief inspectors. But, on the whole, they fell short of what was to be expected of them, and in respect of humane watchfulness in so grave a matter they did not fully justify the status assigned to them by the ryotwari settlement.

In justice, however, to the circle inspectors and to the village headmen, it must be said that the difficulty was immense of picking up all emaciated persons who were wandering about the country. This can be effectually done (as we positively know by experience) in well cultivated, densely-peopled tracts, where every village road, even every by-path, can be kept under the eye of authority. But this becomes almost impossible in a partially-cultivated, sparsely-peopled country like the Deccan, crossed in every direction by hills and jungles. The disposition of the people to wander about begging, the unwillingness of so many of them to resort to relief-works, or even to relief centres and camps where food can be got without work, their readiness to run the utmost risk from privation rather than submit to the simplest system of relief, can only be imagined by those who have seen these things.

With so many classes of this peculiar disposition, and with a country so unfavourably situated, there need not be any surprise if sometimes the best-directed efforts to prevent starvation in individual instances are frustrated.

26. *Numbers on Charitable Relief*.—The following statement shews the number of persons in receipt of gratuitous relief,⁷ month by month. Unfortunately no distinction was made between the different classes of relief, nor is it possible now to shew separately those who were fed in the relief-houses and those who were relieved in their homes. It is evident, however, that the number of the latter class was comparatively small, and

M., para. 27.

² It certainly was not enforced in Belgaum which was looked on as a model relief-house, and where the paupers wandered by day begging through the city (see Bombay Compilation, pp. 307-8; also pp. 397-403), and the rules are silent about it.

³ T., para. 52.

⁴ K. II., para. 39.

⁵ Evidence before Famine Commission, Answer No. 177.

⁶ T., paras. 53 and 54.

⁷ T. 20.

that great distrust was felt of the soundness of this mode of treatment since "those who deserved relief got cheated by the patels, while others got relief who ought not."¹

November	-	-	-	1,589
December	-	-	-	2,711
January	-	-	-	5,441
February	-	-	-	6,320
March	-	-	-	8,695
April	-	-	-	17,047
May	-	-	-	30,146

June	-	-	-	58,244
July	-	-	-	51,978
August	-	-	-	65,256
September	-	-	-	95,674
October	-	-	-	64,630
November	-	-	-	17,188

Total - - - 424,934

The average number relieved daily for the whole period of thirteen months is 32,687. No very precise account is given of the cost of this relief, but Sir Richard Temple states in general terms that it amounted to ten lakhs of rupees. If so, it came to about Rs. 2-6 per head per mensem.

27. *Private Charity*.—Private charity was very active in the early part of the famine and continued in a fairly adequate manner to the last. In Poona and Sholapur the benevolence of rich native gentlemen was conspicuous, and there was hardly a town, great or small, which failed to receive marked benefit from native benevolence in the relief of distress.² In Bombay, when the influx of distressed wanderers began there, subscriptions were raised and a Committee appointed,³ who "shewed remarkable efficiency in relieving this casual and extraneous indigence." On the other hand, Mr. Gibbs felt bound to protest against the mischevous manner in which much of this charity had been lavished.⁴

I feel sure that the experience of the past year has shewn that the effect of the large private charity, as distributed in this presidency, has contributed more than any other cause to demoralise the people.

It is a well-known fact that the princely grants made by Sindhia and other Native Chiefs were distributed almost solely to idle Brahmins and professional beggars, and that the poor starving laborers and artisans got no benefit therefrom. I also know the fact that where private charity was distributed in Poona, it was found that the same persons obtained gifts from two or three houses in the same day. And even where, as at Sholapur, the funds were ably managed under the direction of Mr. Morarji Goculdas, it was found that the able-bodied and those who could easily work for their living formed the larger body of recipients.

So grave an evil did miscellaneous charity seem to me, that I was seriously considering, in the event of the famine continuing for another year, whether some interference on the part of Government would not have become absolutely necessary.

28. *Importation of grain*.—The question was carefully discussed at the beginning of the famine, whether it would be necessary and right for the Government to interfere in the matter of importing grain into the distressed districts, and the conclusion was arrived at that no such intervention was requisite.⁵

In weighing the matter, the Government considered that any decided movement on their part would be likely to act prejudicially on the trade; that if the merchants were led to expect that they would be subjected to the competition of the Government, they would withdraw; and as it was clear that, no matter how powerful the Government might be, and that on however extended a scale their efforts might be made, they could not hope to effect all that the trade, if it exerted itself could do, it was held that it would be better for Government not to enter into the market at all; for though the Government might be able to do more than many merchants could do, they could not hope to effect so much as could be done by all of them. It was, therefore, publicly made known that Government would not in any way interfere with the grain-trade, or with the movements of grain, unless actually forced to do so by failure of supply, or by excessive extortion on the part of dealers; that they would buy nothing on their own account for importation into the affected districts, though they were ready to enter into contracts for the delivery on their own works of food supplies to their own labourers; that, in fact they were not prepared to do more than to act through the trade on behalf of those who came upon their relief-works, and that they would not in any way, themselves, assume the position of traders and importers, so long as they could ensure the people on the works being supplied with food.

From this decision the Bombay Government never departed, and it was, in their opinion, entirely justified by the event.⁶ "From the beginning to the end of the "scarcity, the activity of private trade in grain was extraordinary." The railway imported 267,863 tons into the distressed districts and 166,137 tons were carried by sea (mostly by small country craft), to the ports of the Konkan, and then by bullock-carts up the ghâts to the Southern Deckan. "Still larger imports would no doubt

¹ Evidence of Mr. Spry. See also that of Mr. Moore, Collector of Satara, to the same effect.

² T., para. 55.

³ T., para. 56.

⁴ G., paras. 23, 24, and 25.

⁵ K. I., para. 11.

⁶ T., para. 10.

“ have reached the famine districts if the railway could have carried more,”¹ but their stock of engines and wagons was too small for the traffic. When the distress in July and August in Madras and the Nizam's Territory entailed a still further strain on the carrying power of the railway, it was found necessary to direct that a preference should be given to food-grains booked for the distressed districts, the transport of other grains being postponed till all these had been disposed of. The order was withdrawn in October. It caused considerable inconvenience to the trade of Bombay, upwards of 200,000 tons of grain and oil-seeds being, it was calculated, held back temporarily from exportation.²

* These circumstances were greatly deplored, but could not possibly be averted, by reason of the supreme law which regards the safety of a vast population, in danger of starvation, as paramount over all other considerations.

It is possible, however, that arrangements may be devised for the future by which a stock of engines and wagons may be kept in the country sufficient to meet any strain of the kind.

29. *General efficiency of private trade.*—This was the only point in which Government attempted to interfere in any way with railway traffic. The suggestion that the rates of freight should be reduced so as to encourage importers, was pressed upon it, but was rejected as undesirable. As to inland carriage from the railway stations to distant marts,³ it was ascertained—

From enquiries made from the grain merchants, that any interference by Government with the transport arrangements, or indeed any direct attempts to aid the merchants in obtaining carriage, would only have the effect of increasing the price of cart-hire, and the Government were requested to let matters take their own course.

30. *Supplies of forage.*—For fear, however, lest the supplies of forage should fail along the roads travelled by these carts, steps were taken for cutting and pressing grass in the hill-tracts on the Western Ghâts, and storing it at suitable places, in the Sholapur, Kaladgi and Dharwar districts. About 2,000 tons of fodder were thus prepared and stored, chiefly under the supervision of the Conservator of Forests, at a cost of Rs. 57,742 : the provision, however, turned out to be unnecessary, and there was hardly any demand for the fodder; the realization by its sale amounting only to Rs. 10,704.⁴

31. *Instances of interference with private trade.*—The only other case in which Government took any steps which were of the nature of interference with private trade was in Kaladgi.⁵

From the remoteness of this district, and the fact that it contains few Marwaris and Bunias, the grain-stocks being chiefly held and sold by the Patels and Kulkarnis of the villages, and by the more wealthy ryots, who manifested great reluctance to sell on any terms, it became necessary for Government to take exceptional steps. This was done by sending grain gradually, but not in large quantities, from Belgaum and also from Sholapur.

The quantity thus imported was only 3,000 maunds or a little more than 100 tons, and it cost Government Rs. 23,000 or about 11 lbs. per rupee: the net loss was Rs. 2,600. “No doubt the traders could have thrown in the grain at a less cost⁶;” but still the result of the step was beneficial, inducing the holders of grain to open their stores, and proving to traders that import, even to a tract so distant and so difficult of access, was possible and might be profitable. In some other cases⁷ similar ventures were undertaken, on a small scale, by local and municipal committees, who imported a small quantity of grain when local stocks seemed to be low, and sold it at cost price to the poor of the town.

32. *Carriage of grain by human labour.*—In another direction the resources and versatility of trade were shown in a remarkable way.⁸

After the rains began, the use of cattle for the carriage of grain was supplemented by human labour. Large numbers of persons were engaged both in carrying head-loads and in dragging laden carts. This had the further important consequence of setting free for employment in agriculture many cattle which would otherwise have been necessarily engaged in bringing food for the people. As a measure of encouragement Government directed (Government Resolution No. 254 P., dated 23rd July 1877) that, where practicable, without breach of engagements with toll farmers and contractors, exemptions from tolls and ferry charges should be granted to persons carrying grain, either by head-loads, or in vehicles drawn by human labour. Special instructions were also issued for the protection of persons thus engaged.

¹ K. I., 6.

² K. I., 11.

³ M. para. 7.

⁴ T., para. 12

⁵ K. I., 13.

⁶ Evidence of Mr. Spry, late Collector of Kaladgi, and his reply in Bombay Compilation, p. 246.

⁷ Such as Ahmednagar, Pandharpur and Satara.

⁸ M. 8.

33. *Prices.*—The following statement shows what the range of prices was in the distressed districts for the cheapest common food-grain (jowari or bajri), the average price of ordinary years being from 40 to 80 lbs. per rupee :—

Months.	Khan- desh.	Nasik.	Ahmed- nagar.	Poona.	Shola- pur.	Satara.	Kaladgi.	Belgaum.	Dharwar.
November 1876	24	31	23	22	15	19	16	15	13
December "	31	31	27	20	21	18	14	18	15
January 1877	32	32	30	23	20	20	17	20	18
February "	32	32	26	24	20	20	18	20	18
March "	34	32	25	24	21	20	17	17	17
April "	32	31	25	23	20	18	16	17	15
May "	29½	27	24	20	19	17	19	15	14
June "	28	28	23	19	17	15	12	14	12
July "	25	29	19	16	14	14	10	11	10
August "	19	18	14	13	11	12	10	9	9
September "	18	17	14	14	12	13	9	12	11
October "	23	20	20	19	22	22	12	16	13
November "	20	27	27	23	29	26	19	26	22
December "	31½	25	26½	24½	26	27½	20	32½	33½
January 1878	29	26½	24½	21	16½	26½	30½	30½	27
February "	24½	22½	22½	18½	20½	22½	30½	28	No return received.
March "	24	22½	18½	18½	20½	16½	25	24½	Do.
April "	24½	24½	20½	18½	19	18½	24½	25	20
May "	26½	24½	20½	18½	20½	16½	18½	21	16½
June "	26½	22½	18½	18½	16½	16	16½	18½	16½
July "	27½	21	21½	19½	20½	18½	16½	17½	15½
August "	33½	Not reported.	24½	21½	21	19½	20	19½	17½
September "	29½	20	23½	21½	18½	20½	27½	23½	21½
October "	30	21	22	23	18½	21	27½	25½	22½
November "	35	26½	25½	22	19	21½	26½	26½	24½
December "	33½	28	24½	22½	19½	20½	32½	29	39

This indicates an extraordinary dearness of food, treble and quadruple the ordinary rates at some places for some time.¹

34. *Emigration of agriculturists.*—Reference has already been made to the extent to which emigration was resorted to by the inhabitants of the affected districts. It took two forms: agriculturists who possessed cattle went off with them to the two directions in which they hoped to find pastures, the Western Ghâts and the hilly tracts in Hyderabad; others of a lower position emigrated to places where they hoped to find that employment was either more abundant or was given on easier terms. In order to facilitate the passage of cattle to the forests and pastures on the ghâts, the Government opened the forest reserves for grazing, and gave free passages for cattle by rail from Sholapur to Poona.² In the Eastern Districts the people were advised only to send the cattle most worth preserving, as the weakly ones would only consume the grazing, already too limited, which might otherwise preserve the more serviceable cattle; and in the Western Districts arrangements were made to pass on the herds of cattle as they arrived to wherever grass and water were most abundant. The mortality among the cattle was no doubt very great, but it was believed to have been mainly confined to the old and worthless cattle, of whom a large number are kept by the people; the plough bullocks suffered less, and, when the rain came, only a very small area was left unploughed for want of cattle. Throughout the famine draught-cattle worked in more than ordinary numbers.³

35. *Emigration of labouring classes.*—The other form of emigration, on the part of the labouring classes, was more objectionable, because it disturbed the relief organisation, and threw an unexpected strain on certain localities. A certain number of the Nizam's subjects came to the relief-works in British territory, but a larger number of persons emigrated from Ahmednagar and Sholapur into Hyderabad, and were assisted there by private charity, or received at the works and relief-houses. From the Native States in the Bombay Presidency, where the relief system was less efficient and complete, a considerable number of persons streamed into Kaladgi and Satara. On several occasions attempts were made to segregate these immigrants and deport them back to their own

country; but they soon returned and escaped detection by passing themselves off as British subjects. The general opinion expressed by the Government of Bombay¹ was that it could never be worth while to keep an account of the cost of relief administered to foreign paupers and to charge it against the State from which they came; that circumstances might arise under which it might be right to deport them to their own State, but that ordinarily it is best to receive and treat them without distinction, and that, as a rule, "it is best not to interfere too much with a moderate flow of emigration " in any direction."

36. *Wandering*.—The worst form, however, which this readiness to emigrate from home assumed was a spirit of restless and aimless wandering, which caused immense trouble to the relief officers and great suffering and mortality among the people concerned. Mr. Gibbs writes² :—

It was found generally that persons in a state of great distress, often emaciated from want would come to the relief-house and after having received food and lodging, and, if ill, medical treatment and extra diet, on becoming restored to health and strength sufficient to perform work, would, on accepting *batta* to take them to the next relief-work, go away wandering over the country and return to the relief-house two or three weeks after they had left it, in as miserable a state as when they were first received. In some cases this was known to have happened three times.

Mr. Ashburner also writes to the same effect :—

It is quite incredible to those who have not seen it, how families with the almost certainty of starvation before them would repeatedly desert from the famine-camps in spite of all the remonstrances of the famine officers. It resembled the blind instinct of a wild animal to escape from confinement, rather than the act of an intelligent being. The labors of the famine officers were from this cause never-ending: no sooner had they by careful nursing and nourishing food, brought the famished people into a healthy state, than they would wander away, only to be brought back in a dying state after a few days.

If the famine officers had had the power to detain them till they had some assurance that they could support themselves, not only would the mortality have been much less, but we should have been able to exact some labor in return for the food they received.

37. *Legal power to use compulsion*.—Another cause of mortality was the refusal to accept relief when offered³.—"The obstinacy with which persons almost in a dying state " would go anywhere rather than to a relief-camp. Numerous instances of this nature " were brought to the knowledge of Government," and in order to enable their officers to meet such cases efficiently without straining the law, it was proposed to give them legal powers of compulsion " to send such persons to a relief center, and, when restored sufficiently to health to enable them to perform work, that they should be transferred to earn " their subsistence on relief-works and detained there." This was urged again even more strongly by the two Members of Council when the Sanitary Report revealed the extent of the mortality that had occurred. Mr. Gibbs wrote—

The mortality, whether it be great or little, was due to the ignorance of the people, to their obstinacy and their dislike for work. Had we had power to force the sick and starving to relief-camps, and those fit to work to relief-works, and prevent their wandering, we should, I feel assured, have had a much smaller amount of mortality to lament and a much smaller amount of demoralisation to overcome.

Mr. Ashburner wrote :—

As soon as it becomes quite evident that the people could not support themselves, Government should take power in an Act to move them into famine-camps, where they should be well fed and well worked on a thoroughly organised system. This would give us the command of such an enormous body of cheap but efficient labor that we should be able to carry out public works that would otherwise be impracticable, and famines would then be no longer a burden on the finances. There must be great mismanagement if a laborer and his family cannot earn enough food to keep them in health on useful public works, the designs for which have been carefully matured and considered beforehand.

The Secretary of State replied to this (7th November 1878) :—

The legislative action suggested by some members of your Excellency's Council, for forcing the sick and starving to relief-camps, and for not allowing them to leave those camps without permission, could only be justified by extreme necessity, and its consideration may well be deferred until there is an immediate prospect of such necessity.

It does not appear, however, that the absence of this legal authority hampered officers to any material extent in doing what they felt to be the wisest and most humane thing for these paupers. When an influx of famine-stricken people into Poona and Bombay took place, closed relief-camps were started outside those towns to which all beggars and emaciated people in need of relief were conducted and compelled to remain there. They were fed and treated medically if necessary, and when they had sufficiently recovered, they

¹ Letter to Famine Commission, 15th October 1878.

² G. 19.

³ G. 20.

were sent at the expense of Government to works or to their homes, according to their condition and circumstances.¹

38. *Remission and suspension of revenue.*—The principle of the Bombay revenue system is that, ordinarily speaking, good years should pay for bad, and a moderate assessment based on the produce of average years should be paid in all years alike. But when there is a great and almost absolute failure of crops in any locality, it has been the custom to remit the revenue or a part of it absolutely: and accordingly when the extent of the famine first began to be realized, the Government proposed to remit from half to three-quarters of a million sterling. To this proceeding, Sir R. Temple, when he first visited the Presidency as Famine Delegate, strongly objected and pointed out the great importance of not sacrificing so large a sum if there was any possibility that it could be temporarily suspended and collected afterwards in more prosperous years. The system of suspension was unknown to the Bombay officers and its propriety was at first contested; but it was supported by the Government of India, and the Bombay Government agreed to try it, issuing instructions to warn its officers against too free remissions and authorizing them to hold balances in suspense in cases where it appeared likely that the ryot would, without undue pressure, be able to pay up in the next season.² The result of these orders is thus narrated in Sir R. Temple's minute. The entire revenue of the Presidency (excluding Sindh) is 262 lakhs of Rupees, and of the nine famine districts 140 lakhs of Rupees. Out of this only Rs. 2,16,000 were actually remitted, and Rs. 50,00,000 were suspended,—a sum which was ultimately reduced by the end of 1877 to 27 lakhs. If the season of 1877 had been favorable, all would have been got in; but as the rains were late and unequal, the balances had to be held over for a still longer period and the whole sum has not yet been collected.

39. *Native States.*—The statement in paragraph 7 showed in abstract form the population and area affected in the Native States which lie within the Bombay Presidency. The system of relief was the same as in the British Districts.³ Revenue was remitted, employment was offered on works, and gratuitous help given to the non-workers. The wages on the relief-works were low,⁴ and in many cases the Bombay Government scale was adopted. At the poor-houses cooked food was distributed,⁵ and grain doles were made through the village officials to those who were house-ridden. The following statement shows the amount expended in relief:—

STATE.	Revenue remitted.	Revenue suspended.	Per cent. of remissions and suspension on total Revenue.	Cost of relief-works.	Cost of gratuitous relief.	HIGHEST DAILY AVERAGE.	
						On relief-works.	On gratuitous relief.
Kolhapur - - -	Rs. 3,546	Rs. 97,395	6·5	Rs. 2,60,313	Rs. 55,799	9,957 (May)	5,176 (Sept.)
South Mahratta States (seven).	30,655	6,17,387	50·6	4,50,019	52,677	8,196	2,711
Sangli - - -	1,48,631	2,80,699	87·	21,803	22,786	8,541 (Dec. '76)	1,866 (June)
Jath - - -	—	78,534	83·	49,186	12,393	5,010 (May '77)	1,214 (Sept.)
Akalkote - - -	—	1,70,340	58·	—	—	—	—
Savanur - - -	1,495	m. 277	33·	5,212	—	300	—

Besides these two, other Satara Jaghirdars (Phaltan and Pant Prithinidi) expended about Rs. 12,000 on relief-works, and the highest number of persons relieved at any time in these States was 4,215. Again in 1878, the scantiness of the rains of 1877 having produced considerable distress in Guzerat and Katiawar, relief was afforded in most of the Native States in Katiawar. The Political Agent's report shows that in 39 States

¹ M 33.

² B. B. IV, 18.

³ The following facts are compiled from replies sent by the Political officers of these States, through the Bombay Government, to the Famine Commission.

⁴ In Jath and Kolhapur the Government sliding scale was followed. Of the small South Mahratta States, three adopted the Government scale: the other four gave various rates of wages, about two annas on an average to a male laborer. In Sangli the wage was from 1½ to 2½ annas for a man.

⁵ The amount is only stated in the case of Kolhapur, where an adult got one pound of jowari bread and some pulse soup.

Rs. 10,30,942 were expended on relief-works and Rs. 1,36,375 in charitable relief: but the numbers cannot be correctly stated. Relief was given altogether on the British pattern, and lasted mainly from February to July 1878. Probably something like 100,000 people were employed for some two or three months on the works, but no accurate statistics were kept, as after all this was only a brief scarcity.

40. *Proportion of population relieved to population affected by famine.*—The following table shows the highest number relieved at any one time in each of the distressed districts¹:—

	Population affected.	HIGHEST NUMBER RELIEVED.		
		Month.	Number.	p. c. to Population.
Khandesh - - -	646,944	September - - -	24,595	3·8
Nasik - - -	250,000	April - - -	25,997	10·3
Ahmednagar - - -	677,376	June - - -	59,129	8·8
Poona - - -	318,601	August - - -	75,113	23·5
Sholapur - - -	718,034	June - - -	99,617	13·8
Satara - - -	461,000	June - - -	70,188	15·2
Kaladgi - - -	816,037	September - - -	173,736	21·2
Belgaum - - -	501,000	May - - -	61,773	12·3
Dharwar - - -	630,000	June - - -	82,091	13·0

The highest percentage is that of Poona, but here the population affected is perhaps understated, being too strictly confined to the eastern talukas, while in the centre and west of the district there was considerable distress. In Kaladgi the whole population of the district is shown as affected, and the relief required and administered there was larger than in any other place.

41. *Summary of numbers and cost.*—The total numbers relieved gratuitously and by works have been separately shown in paragraphs 21 and 24: the average number in daily receipt of all kinds of relief in the nine districts was 317,687, or about 6·3 per cent. of the whole affected population. The cost of the relief up to the end of December 1877 is thus stated²—

	Rs.
Relief-works - - - - -	93,00,000
Gratuitous relief - - - - -	10,00,000
Supervision and establishment - - - - -	11,00,000
Total	1,14,00,000

Or about Rs. 2·5 per head on the whole affected population. There was a further sum of Rs. 2,16,000 on account of revenue remitted and Rs. 40,700 was the diminution in the receipts from excise. But the accounts cannot be considered finally closed till it is reported what portion of the suspended revenue has had to be remitted and what the additional cost of relief due to the prolongation of distress in 1878 and 1879 has been. It has already been observed that the cost of relief-works up to the end of March 1878 was Rs. 1,15,67,000, or larger by Rs. 22,67,000 than the figure stated above. Against this expenditure has to be set the value of the works executed, which was calculated at Rs. 81,14,000. Sir R. Temple³ also claims to bring to account part of the increased receipts from the guaranteed railways, which amounted, in the year ending 15th October 1877, to 67 lakhs of rupees. Admitting that the brisk export trade in wheat and oilseeds would have by itself considerably enlarged the receipts, he reckons that 32 lakhs may be set down to this, and 35 lakhs to the famine trade. In any case, however, the Government receives only half the net profit on the railways, so that the whole cannot be taken as a set-off against famine expenditure. And, besides, if it be true that the trade in grain carrying 265,000 tons, thrust aside a trade of upwards of 200,000 tons of wheat and oilseed which had to be refused transport, and part of which no doubt took cart and thus made its way to Bombay, a still further deduction from the famine gains has to be made. On the whole, it may be admitted that the Government probably received some set-off by the increased traffic, but the actual figure is too uncertain for any definite estimate to be made here.

42. *Mortality.*—*The Test Census.*—The main set-off however for famine expenditure consists in the fact of having saved the lives of the people. On this subject a considerable

¹ T., para. 13.

² T., p. 36.

³ T., 86.

amount of research has been made. A test census was held in January 1878 in five of the districts in which famine had been severest: and in each case two talukas were selected, one of which was supposed to be the worst and one to represent the average of the district. The result of the test census was as follows:—

District.	Taluka.	Census of		Loss.	Percentage of decrease.	Loss of affected portion of district reckoned at the same percentage.
		February 1872.	January 1878.			
Sholapur	Sangli	62,690	60,640	2,320	3.7	—
	Madha	103,981	83,317	20,664	19.9	—
	Total of District	718,000	—	—	13.8	99,084
Satara	Man	62,198	54,686	7,512	12.1	—
	Khatau	81,950	73,668	8,282	10.1	—
	Total of affected part of District	461,000	—	—	11.6	53,476
Kalađgi	Bagalkot	110,185	97,177	13,008	11.8	—
	Badami	114,238	90,489	23,799	20.8	—
	Total of District	816,000	—	—	16.4	113,824
Belgaum	Athni	114,677	99,554	15,123	13.4	—
	Sampgaon	131,504	125,804	5,700	4.3	—
	Total of affected part of District	501,000	—	—	8.4	42,084
Dharwar	Ron	73,503	68,065	5,438	7.4	—
	Kod	79,099	80,472	+1,373	+1.7	—
	Total of affected part of District	630,000	—	—	2.6	16,380
Grand Total		3,126,000	—	—	10.7	344,848

This shows that there were approximately fewer people by 344,000 in the worst part of those five districts than there had been in February 1872. But what proportion of those had died, and what proportion had emigrated and were still alive and likely to return in better times, is uncertain. The district officers report that many emigrants have returned since the test census was taken.

43. *Mortuary statistics.*—The second source of information on this subject is derived from the mortuary registration, which have been carried on for more than ten years, and having reached a very fair degree of efficiency has now become an important and valuable key to reveal facts which have been concealed in all previous famines. An extract from a note written on the mortality in all India is appended to this history: and it is sufficient here to note the prominent facts which have to be dealt with. The number of deaths registered in the whole province rose from 343,561 in 1876 to 601,278 in 1877 and 503,883 in 1878: being an excess during the two years of 418,039. But the true number of annual deaths has never yet been recorded: it is believed that the real death-rate is about 35 per mille per annum: and if so only about two deaths out of every three that occur are recorded. Supposing that the same error existed in 1877 and 1878, the true number of deaths that occurred in those years must have been 1,782,510, against an average (at 35 per mille) of 980,000: the excess deaths therefore were 800,000. Looking back to the five districts in which the test census was taken, the recorded mortality in them was—

	Deaths.	Per mille.
In 1876	126,489	27.9
1877	324,241	71.7
1878	178,302	39.9

being an excess of 249,569 over the death-rate recorded in 1876. If the same assumption be made that the true average mortality is, at 35 per mille, 157,270 in these districts, and that the registration of 1877–78 was as faulty as that of 1876, then the true mortality of those two years was 630,000, being an excess of 315,000 over that of ordinary years. This does not fall far below the loss shown by the test census. The propriety of adopting this method of calculation and of assuming that the registration of 1877–78 was faulty in the same ratio that that of the previous year had been, is disputed by the Bombay autho-

rities. It is maintained that the registration of the famine years was better than in ordinary years, because attention was specially drawn to the subject, and very strict orders given regarding the duty of recording all deaths. This no doubt is true, but, on the other hand, the difficulty of accurate registration was greatly increased by the emigration and wandering, and all the deaths of unknown people in out-of-the-way corners and by-roads are hardly likely to have been brought on the record.

44. *Birth statistics.*—Another interesting and comparatively novel point brought out by these figures is the effect of famine on the reproductive powers of the race. In the nine famine districts the birth-rate fell from 26 per mille in 1876 to 20·3 per mille in 1877 and to 13·8 in 1878 : and it is calculated that altogether the number of births in those two years was less by about 200,000 than it is in two average years. The check to the ordinary birth-rate has not ceased to operate, but is believed to be still observable in 1879.

45. *The relation of the mortality to the famine administration.*—Granting, however, that the mortality was as great as has been represented, the question still remains how far it can be attributed to the famine at all, or if so attributed, whether it was avoidable by a more perfect system of relief administration, or whether it was the inevitable consequence of the same climatic irregularities which produced the drought. The first and most extreme view is taken by Sir R. Temple, in his minute of 20th August 1878, in which, by deducting the deaths from cholera and small-pox as due to specific epidemics altogether unconnected with famine, and a certain portion of the deaths from fever, which was unusually severe, he reckons the deaths really due to famine in 1877 as about 100,000, of which 50,000 are known to have occurred within the relief-houses. To this it is answered that the facility with which people succumb to these epidemics is of itself one of the effects of famine, being due to weakness and want of food. Thus Dr. Cunningham, Sanitary Commissioner with the Government of India, writes¹ :—

To me it seems impossible to dis sever the prevalence of any disease from scarcity or famine pressing on a population at the time. Prevalence of disease means either (1) a generally unhealthy year, generally unhealthy from causes which are still extremely obscure; or (2) insanitary conditions in the locality otherwise known as local disease causes; or (3) unfavourable condition of the people themselves. These causes run into one another, that is to say, they may all three be present and more or less active at the same time, so that it may be and probably will be impossible to decide how much of the sickness and mortality ought properly to be ascribed to each. But the third cause, when it exists, can never be ignored altogether. If the people are in an unfavourable condition, and there can be no condition more unfavourable to health than want of food, then this condition must have its influence, and in all probability a very great influence, on the extent and severity of the prevailing sickness, by whatever name it may be called, whether cholera, or small pox, or anything else.

The most recent contribution to the discussion is that of the Army Sanitary Commission, who in their review of Dr. Hewlett's report for 1877 point to the abnormal prevalence of specific epidemics as evidence of an insanitary condition in the air and water, due to the seasonal irregularity and the deficiency of rain, the deadliness of which no administrative measures can fight against.

They show that, separating the famine from the non-famine districts, the mortality from different causes has been as follows :—

Disease.	RATIO PER MILLE.	
	Famine Districts.	Non-Famine Districts.
Cholera - - - - -	5·8	1·8
Small-pox - - - - -	2·4	1
Fevers - - - - -	28	13·7
Bowel complaints - - - - -	5·9	1·6
All causes - - - - -	55	35·2
Per cent. of epidemic deaths to total deaths - - - - }	77	51·5

They hold that as cholera decreased in intensity while the famine increased, it should be "eliminated from the deaths specially due to privation," though they also say that "food scarcity and what led up to it in these districts acted fatally on all the chief death causes, specially on those registered as cholera, fevers, and bowel complaints."² They wind up with the following conclusions :—

- (1) The year was a great epidemic year all over the south of India.
- (2) The rainfall of 1876 was only half the average of the preceding five years. "In the most severely affected district no more than 4·76 inches fell. Deficient rainfall leads not only to failure of crops, but to failure of water supply and impurity of all domestic water sources. The two results must be considered together in estimating the causes of mortality during the famine year.
- (3) So far as concerns the food supply of the people, the abstract already given shows that the price of food during the months of greatest scarcity rose nearly fivefold, and this among a people having few or no resources to fall back on.

¹ 26th October 1878 (see my note on vital statistics, para. 26).

² See paras. 14 and 15 of memorandum.

(4) The disease group which showed the most direct relation to the price of food was "bowel complaints," and to this fact must be added the result of Dr. Douglas Cunningham's discovery of the relation of deficient food to permanent pathological changes in the digestive organs, leading to death.

(5) The "fever group" increased in fatality with the rise of prices in 1877, but together with increasing scarcity there came rainfall in augmented proportions month by month, with great increase monthly of fever mortality, a usual consequence of rain after drought.

(6) The mortality from Cholera did not increase with the rise in the price of food. It was lowest at the time of highest price, but it fell rapidly when the amount of rain was greatest.

With these facts before us, it is impossible to deduce from them the absolute mortality due to food scarcity by itself, which, after all, was only one of the elements in the question. The primary cause of the entire calamity was want of water for cultivation and for domestic use. To this added cause in 1876 it was due that the crops failed and scarcity prevailed in the following year. To the same cause was due, as already shown, the aggravation of cholera, which ceased when rain fell, and also the augmentation of fever with heavy rainfall after drought. If every one had been sufficiently fed in 1877, most of the mortality and its causes would have been left untouched. And so far as concerns the food supply, the facts in Southern India all point in the same direction, and that is, that there is a stage of privation which, if once passed, renders any relief measures in the way of increase of food not only useless but a cause of death, and hence, whenever deficient rainfall in one or several years bodes scarcity during the years following, the fact of the diminished rainfall must be taken as the index of famine and not the scarcity, and provision made accordingly.

General Conclusion as to the Famine Policy of the Bombay Government.—No system can be considered successful which does not steer evenly between these two dangers, avoiding on the one hand the evil of relieving the population in a way which shall not entail enormous expense on the State and the certainty that much of that expenditure will go into the pockets of people who are not in absolute want, and on the other hand the danger of deterring them by severe and vexatious discipline from accepting the offered relief. If the Bombay Government erred at all it may have been in the latter direction, and it is possible that sufficient attention was not paid to the duty of insisting that the relief offered was accepted. But admitting this, it may still be asserted that the Government deserves the credit of having done more than ever was done before to reconcile the requirements of the pauper with the necessities of the State: and to work out a system under which a sufficient amount of State-help is offered to those who show, by submitting to moderate and reasonable restrictions, that they really stand in need of relief.

30/8/78.

C. A. E.

SECTION 4.—HYDERABAD.

[Materials—(1). A general report by Maulvie Mehndi Ali, Secretary to Government in the Revenue Department, (2) and (3) Reports by Mr. G. Palmer, and Maulvie Mushtak Ali, on the relief-works and poor-houses respectively.]

The Famine Tract.—The drought of 1876 extended to the southern half of the Hyderabad territory, that is, to the tract lying in the angle between the famine districts of Bombay, Ahmednagar, Sholapur, Belgaum, and Dharwar, on one side, and those of Madras, Bellary, and Karnul, on the other: its boundary may be roughly defined by a line running through Hyderabad City, east-south-east and west-north-west. This tract included eight out of the seventeen districts of which the State is composed; but the greatest intensity of famine prevailed in the south-east angle between the Tunga-Bhadra and the Kistna, known as the Raichor Doab. The following are the approximate statistics of area and population:—

District.	Affected.		Most affected.		Supposed Average rainfall.	Rainfall of 1876.	Results.
	Area.	Population.	Area.	Population.			
Raichor - -	2,752	296,000	2,752	296,000	18	13·13	Nearly total failure.
Linsugur - -	2,264	252,000	2,264	252,000	18	5·45	Total failure.
Nagar Karnul - -	5,184	157,000	—	—	24	13·74	Partial failure.
Nalgunda - -	7,424	226,000	544	40,000	24	14·25	Ditto.
Shorapur - -	2,112	272,000	512	61,000	18	7·55	Considerable extent of failure.
Gulbarga - -	3,456	198,000	—	—	20	12·38	Partial failure.
Naldurg - -	3,420	267,000	416	40,000	22	14·0	Ditto.
Bhir - -	4,096	258,000	454	40,000	22	17·9	Ditto. Western portion worse.
Total -	30,708	1,926,000	6,942	729,000	—	—	

In one part of the Lingsugur district it was estimated that the crop was altogether lost; in the rest of the "most affected part," about one-fourth of the average harvest was gathered in, and in the remainder of the famine tract the loss was estimated at only one-third. The two previous years had been fairly good; stocks were large and prices were low. Not much is known of the average rainfall, as rain gauges have only lately begun to be used; but since July 1875 the record has been carefully kept at the headquarters of each district, and the figures for 1876 may be relied on—

Months.	Raichore.	Lingsugur.	Nagur Karnul.	Nalgunda.	Shorapur.	Gulbarga.	Naldurg.	Bhir.
June - - - -	5.62	2.88	3.11	2.28	2.38	3.84	5.13	3.96
July - - - -	1.74	1.00	4.89	4.02	2.33	2.35	2.12	8.01
August - - - -	1.43	.39	3.28	3.92	1.07	2.26	3.61	3.40
September - - - -	3.92	1.15	1.57	1.97	.82	2.61	2.37	2.34
October - - - -	Nil	.03	Nil	Nil	.09	.28	Nil	.18
November - - - -	Nil	Nil	Nil	1.16	Nil	Nil	Nil	Nil

2. *Brief History of the Famine.*—The first alarm was given in October 1876 by the district officers of Raichor, Lingsugur, and Bhir, who reported an utter failure of the kharif. On this a circular was issued by the minister, Sir Salar Jung, containing the following instructions:—No interference was to be permitted with prices of food grains; useful public works were to be opened in districts where relief was wanted and ordinary works to be stopped in other parts; and weekly reports were called for from all districts on points indicative of the condition of the country. A central relief committee was appointed to carry out these instructions, and special officers were deputed to report on the state of things in the parts threatened. In January 1877 (on the 11th and 12th), Sir R. Temple paid a visit to Hyderabad and wrote a minute describing the condition and prospects of the country, and the arrangements made for administering relief, which he considered "creditable to the prudence and foresight of His Highness the Nizam's Government." At this time (he was told) there were about 5,000 people¹ on the relief works, and it was estimated that at most 25,000 in all would require relief. Confidence was felt that there would be no dearth of food, as local stocks were large and the produce of the northern districts good, in fact, exportation was still going on briskly into the Madras country. On 13th March the Resident, Sir R. Meade, sent up a report to the Government of India. The rabi had then been harvested and was generally good, though there had been more or less failure in the affected districts; want had nowhere "arisen to a condition of actual famine, and the "area in which it prevails is much more circumscribed than was thought to be the case" at first. On the 6th February, 26,000 people had been employed on the relief-works, of whom 11,000 were emigrants from British territory; and it was in contemplation to establish poor-houses for the helpless poor; there had been a small emigration of about 9,000 people into British districts, balanced by an immigration from those districts of 28,000. Famine was confined to an area of 3,400 square miles, and a population of 360,000 people,² and no case of starvation had been reported. In the five months ending with January 1877, 40,000 tons of food grain had been exported from the State, and yet jowari was selling in most parts at 9 to 10 seers, and the highest quotation was 9 seers. It was estimated that the number to be provided for in the hot months would not exceed a daily average of 43,000. Poor-houses were opened at Raichor in March, and at other places in April and May, and these and the relief-works were visited at different times by various members of the relief committee. The worst months were July and August, when the rain threatened to hold off a second time, but at last in September it began to fall abundantly, and in November all relief was closed, the numbers having by that time dwindled down to a minimum: only a few paupers remained on in the poor-houses till January 1878.

3. *Administrative measures. Relief works.*—The relief-works were carried out by the officials of the Public Works Department. A set of rules was issued in February, the principal heads of which were as follows. Every applicant for relief was first to go to a Civil officer, who would enquire into his necessity and if satisfied would register him in a book and give him a metal ticket with a number corresponding to that in the register, on presentation of which he would be received on the works. There he would be placed

¹ The real number was 20,000, see page 54, M.A.

² I have not followed this statement in drawing up the table in the preceding paragraph, as it was obviously far short of the truth.

in a gang, his task set him, and a ticket given him in the evening, on presentation of which to the Civil officer he would receive his pay. The wage was fixed at 2 annas (or $2\frac{1}{4}$ annas afterwards) for a man, $1\frac{1}{2}$ annas for a woman, and 1 anna for a child: this was afterwards raised when prices grew dearer to 2 annas 7 pie for a man, $1\frac{3}{4}$ for a woman, $1\frac{1}{4}$ for a child, the intention being that a man should be able to purchase two pounds of jowari—which was a little more than was required for his food, and left a margin over for salt, spices, &c. Nothing is said in the rules as to fining labourers for short work, but the District Engineers were reminded that “the object is to obtain a fair amount of work for the money expended, and to prevent the cost of works carried out as famine relief from exceeding the estimates at the ordinary rates.” Mr. Palmer states that this attempt to regulate admission to the work by the personal knowledge of the relieving officer did not succeed well: “many people obtained employment on ‘famine works’ who really were not in that state of distress that warranted relief being given to them; many possessed jewels and ornaments, and many were said to be the ‘wives of policemen, sepoys, &c.’” The ticket system failed from the difficulty of supplying enough tickets, but daily payments were always made. With regard to the work done, Mr. Palmer observes¹ that including all costs of establishment, the rates were intended to be—

Digging moorum or gravel, for metalling the roads, 3 cubic yards per local rupee.

Digging black earth; $7\frac{1}{2}$ cubic yards per local rupee.

Tamping and watering moorum, Rs. 3-12-7 per thousand superficial feet.

“Work, however, was never found to be done so cheaply as this, no doubt individual gangs could do it and frequently did, but the exigencies of famine works, such as shifting gangs to different parts of the work, time taken up in registration, time-keeping, and payment, giving coolies unnecessary work to do for the want of tools or the want of space to work in, keeping many coolies idle for similar reasons, want of sufficient skilled supervision, and many other causes, prevented these rates from being obtained throughout a work.”

The actual value of the work done is shown in the following table² :—

District.	Earth work in cubic yards per rupee.			Road repairs per mile.		Remarks.
	Ordinary rates.	Famine rates.		Ordinary.	Famine.	
		Rs.	A. P.		Rs. A. P.	
Lingsugur - - -	0 2 0	0	14 1	*300	2,873 3 2	*The rate Rs. 300 per mile is what would generally be allowed in ordinary times for the kind of work that the famine coolies were expected to do. They, however, frequently did more than this and reconstructed portions the repairs only of which had been previously allowed for.
East Raichor - - -		0	3 11		2,370 13 8	
Shorapur - - -		0	3 3		2,768 3 1	
Gulbarga - - -		0	10 1		743 0 0	
Naldurg - - -		0	4 0		991 0 1	
Bhir - - -		0	4 4		414 9 9	
Nalgunda - - -		0	2 8		256 8 7	
Nagur-Karnul - - -		0	2 5		—	

4. *Poor-houses*.—In the poor-houses relief was confined to the helpless and to those who were unable to perform any but a very light task. Residence was not insisted on, but cooked food was given, the following were the quantities of jowari flour in each ration :—

					Light-workers.	Non-workers.
Males above 15	-	-	-	-	1½ lb.	1 lb.
Females and children between 12 and 15	-	-	-	-	1¼ lb.	1 lb.
" " " 6 and 12	-	-	-	-	-	¾ lb.
" " " 3 and 6	-	-	-	-	-	½ lb.
Below 3	-	-	-	-	-	¼ lb.

To every lb. of jowari was added 90 grains (1 tola) of salt and a small quantity of condiments (chatni) thus composed—

							Tola.
Salt	-	-	-	-	-	-	½
Chilies	-	-	-	-	-	-	1
Tamarind	-	-	-	-	-	-	1
Onions	-	-	-	-	-	-	½

The paupers were separately classed as Hindus, Musalmans, and Pariahs, separate sitting places were provided for them to take their food in, and care was taken that the food should be separately cooked by the proper people. Separate sheds also were erected within the enclosure, in which members of those different classes might sleep if

¹ M.A., p. 13.

² M.A., p. 61.

they chose, but residence was not made a condition of relief. The reports do not mention whether any dislike was popularly felt towards this system. Light work in making ropes and mats, and baskets, &c., was provided as far as possible. The total value of the work thus turned out was Rs. 20,074, after deducting the cost of the raw material. Admission depended partly on the applicants' poverty, into which enquiry was made, and partly on the medical officer's certificate that he or she was unfit for regular work; and the reports give the impression that the right of any applicant to receive gratuitous relief was canvassed with some severity. Besides the inmates of poor-houses, 1,265 "pardnashin" women received a money wage of Rs. 2 to Rs. 2-8 a month on the certificate of three respectable residents: an attempt to exact some spinning work in return for this relief was defeated by the almost unanimous vote of the Committee. About Rs. 20,000 were also spent in charitable relief in other places where poor-houses were not established. The following extract from Maulvie Mushtak Hosein's report gives some further information about the poor-houses¹:—

"The total number of the poor amounted to 63,009 of whom 12,049 or 20 per cent. were adult males, 23,252 or 35 per cent. adult females, and 27,708 or 45 per cent. children, or one-fifth of the poor-house inmates were males, one-third females, and one-half children. The great preponderance of the last was owing to this circumstance that people who could themselves pick up a livelihood elsewhere sent their children to the poor-house, that they might so lessen their own burden, and the excess of females over males is accounted for by the obvious reason that the former have, of course, fewer openings than the latter to earn their bread. Of the gross number 25,225 or 40 per cent. were obliged to work, the rest were non-workers. This proportion shows that children also were included in the former class when they were not too tender of age to turn their hands to any profitable occupation. Classified according to their religious persuasions, 16,822 or 26 per cent. of the inmates were Mahomedans, 33,320 or 53 per cent. Hindus, and 12,867 or 22 per cent. of other low castes. Analysed according to their professions there were 14,892 or 22 per cent. cultivators, 38,182 or 62 per cent. labourers, and 9,935 or 16 per cent. belonging to various other professions. Again 60,496 were subjects of His Highness the Nizam, and 2,513 were British subjects. Of the latter 1,090 came from Kaladgi, 483 from Sholapur, 151 from Karaul, 335 from Adoni, 289 from Bellary, and 165 from other districts.

"The total number of deaths among those who received poor-house relief amounted to 2,293. This gives a percentage of 3.6 deaths, calculated on the total number of inmates, i.e., 63,009. The mortality does not appear to be in any degree excessive. Considering that many of those who died were brought in in a state of extreme exhaustion consequent upon starving or fatigue, and that others again came afflicted with the germs of one or another fatal disease, such as cholera, fever, &c., the number of deaths seems very small. * * * *

5. *Statistics of relief.*—The following table shows the average daily number employed on works or fed in poor-houses for each month of the famine, together with the average monthly prices of jowari and rice at Hyderabad. The worst month was July, when the stoppage of the rains seemed to threaten another year of famine. The total average number of persons relieved during the ten worst months, January to October, was 26,000, or 1.36 of the entire affected population. There is remarkably little difference between the cost per head on relief-works and in poor-houses.

Months.	Average daily number on works.	Average daily number in poor-houses.	Price at Hyderabad of	
			Jowari, seers per rupee.	Rice, seers per rupee.
August 1876	—	—	17½	—
September "	—	—	14½	8
October "	—	—	9	6
November "	—	—	8	5½
December "	7,516	—	9	5½
January 1877	19,790	—	8½	5½
February "	21,012	—	9½	6
March "	8,321	—	10½	5½
April "	7,048	1,578	9	5½
May "	16,432	8,842	8½	5½
June "	25,800	11,130	7½	5
July "	38,434	14,561	5½	4½
August "	29,310	10,414	5½	3½
September "	21,703	13,538	6	4½
October "	6,231	4,010	7½	4½
November "	80	506	—	—
December "	—	92	—	—
January 1878	—	11	—	—
Grand Total employed or relieved for 1 day	6,217,738	1,998,038	—	—
Average daily number employed for 11 months	18,290	—	—	—
Average daily number relieved for 10 months	—	6,471	—	—
Expenditure, Total	Rs. 8,38,122	2,44,347	—	—
Average cost per head per diem	" 0 2 2	0 1 11	—	—

¹ M.A., pp. 62, 63.

The following statement shows how the relief was distributed over the affected districts :—

District.	Population.	Relief Works.			Poor-Houses.		
		Highest number employed on any one day.	Average number employed while works were open.	Per-centage of column 3 on column 2.	Number of persons that received poor house relief.	Average number while poor-house was open.	Per-centage of column 7 on column 2.
1	2	3	4	5	6	7	8
Raichore - - -	296,000	18,813	5,389	6.35	16,117	2,682	.90
Lingsugur - - -	252,000	19,890	6,427	7.89	26,817	3,135	1.24
Nagar Karnul - - -	157,000	2,072	1,268	1.31	—	—	—
Naigunda - - -	227,000	4,430	1,230	1.95	—	—	—
Shorapur - - -	272,000	9,730	4,122	3.57	8,091	1,005	.36
Gulbarga - - -	198,000	5,905	2,855	2.98	7,492	856	.43
Naldurg - - -	267,000	2,864	1,163	1.07	1,944	1,022	.38
Bhir - - -	258,000	2,852	2,602	1.11	2,548	—	—
Total -	1,927,000	66,556	25,056	3.45	63,009	8,700	.45

6. *Emigration.*—The returns prepared by the officials of the State show that while 14,500 residents of Hyderabad emigrated to British territory, the number of British immigrants was 57,400. The immigrants came from Sholapore and Ahmednagar on one side, and from the adjoining Madras Districts on the other. On one occasion the Madras Government was requested to recall its own subjects, but with this exception the principle adopted by the State was that the relief measures should be equally open to all applicants, from whatever part they came. On this subject Maulvi Mehndi Ali writes as follows :—¹

“The Madras Government frequently complained and earnestly urged the calling of such of His Highness’s subjects who, living on the borders of the Madras territories, had proceeded to the Madras relief-works, simply because they were nearer their homes and could get to them without experiencing any great inconvenience. This Government, on the other hand, has always held that in such critical times the ryots should be allowed perfect freedom to proceed without restraint wherever they would with the view to their own convenience in securing their livelihood. * * * Nawab Wahid Munawar Khan, Sudder Talukdar of the North-Western Division, gives an account of what he saw with his own eyes at Asteh in the Bhir District. He says ‘the people of Asteh treated their emigrant brethren with remarkable kindness. They allowed many of them to take shelter in their own lodgings, gave protection to their cattle, and employed such as were willing to labour in their fields.’ There is, however, nothing strange about the matter, inasmuch as the poor cultivating population of India are always accustomed to show sympathies towards their brethren in distress.”

7. *Land revenue remissions.*—The land revenue of the eight affected districts had been Rs. 82,78,301 in 1875–6, but in 1876–77 only Rs. 60,91,094 were collected, and in 1877–78 only Rs. 74,58,876, making a deficit in the two years of Rs. 30,06,632, or thirty lakhs. Of this 18½ lakhs were remitted, and the balance 11½ lakhs has been suspended, and it is expected that three-fourths of it will have to be remitted. If this expectation is realised, the loss in revenue will have been 27 lakhs of rupees, or 33 per cent. of the ordinary Government demand in the parts affected.

¹ Mr. W. Oldham, B.C.S., special relief officer, Bellary, said in his evidence before the Famine Commission (4th February 1879): “The crowds of foreigners, subjects of His Highness the Nizam, became so great, that in order to distinguish them from Bellary people, the relief had to become parochial. Between July and November 1877, I picked out 80,000 Hyderabad people. These people came mostly from the territories of the Rajahs of Godwal and Suddanur, touching our border, where no relief was given, except that there was a kitchen in each; but I think the relief was mainly confined to Brahmins and Lingayets. Many also came from Sir Salar Jung’s own zemindari, Kopal, where no relief work was opened. At first I took all on, but when the numbers became unmanageable, I separated them and marched them back The first great body of foreigners I dealt with by giving them three days’ pay, closing the work, telling them they must go back home, and stopping the ferry over the Tungabhadra to prevent their returning to Adoni. This caused great suffering; crowds of Hyderabad people declared they were residents of certain villages in Adoni, received tickets for village relief as such, were disavowed by the Reddis when they got there, and came back to the works which they found closed. After seeing that this plan failed, I kept all foreigners on the works, and communicated with Hyderabad, who after two months’ delay appointed an officer to receive emigrants back. I then marched them back and made them over to that officer, who gave a receipt for them. I got receipts for about 11,000. Only one old woman was sent back to me from Hyderabad.”

8. *Summary of cost of relief.*—The entire cost of the famine to the Hyderabad State is thus set forth :—

	Rs.
1. Relief-works - - - - -	8,38,122
2. Extra establishments on do. - - - - -	80,295
3. Relief-works (not special) under Public Works Department - - - - -	1,23,870
4. Poor-houses - - - - -	2,41,347
5. Orphans - - - - -	18,687
6. Miscellaneous charity - - - - -	70,185
7. Revenue remitted - - - - -	27,00,000
Total - - - - -	<u>40,75,506</u>

SCARCITY in the NORTH-WESTERN PROVINCES and OUDH.

1877-78.

[The materials for this paper are—(1) the recorded Proceedings of the Government of India; (2) the chapter in the Administration Report of the Province which gives an account of the scarcity down to the end of March 1878; (3) a file of reports from Commissioners sent by Mr. C. Robertson, Secretary to Government; (4) the provincial weekly progress reports; (5) two statements drawn up by the North-Western Provinces Government, showing the monthly numbers on relief and the amount expended.]

1. *Condition of the Province before the drought.*—The seasons of 1874, 1875, and 1876 were favourable in the North-Western Provinces and Oudh, and the harvests of those three years were considerably above the average. The stocks, depleted by the drought of 1873 and the drain to Behar, were thus replenished, and grain became abundant and cheap, prices being lower than they had been for more than twenty years. This prosperous condition extended to the Punjab also; and wheat being at this time unusually dear in England, a great export of grain for the first time set in in that direction. At the same time the wants of Madras and Bombay invited the influx, not of wheat or barley, which are little consumed there, but of gram and millets; and thus the country was drained simultaneously both of its best and its commoner kinds of grain by a process which poured large sums of money into both provinces, but necessarily brought down the superabundant food-stocks. The trade was so active, that the railways were unable to carry off the quantities of grain brought for export, so that much of it was forced to travel by river and canal; and it was hoped by many that the new demand in England for Indian wheat would become permanent, to the great advantage of the agricultural interest.

2. *The drought of 1877.*¹—This hope was frustrated by the extraordinary failure of the southern monsoon over all Upper India, which, as in former occasions, followed, with a year's interval, on the equally extraordinary failure in Southern India. The rainfall in January, February, and March had been above the average, and had done some injury to the splendid spring crops; April and May were abnormally cool. In June the southern monsoon set in with signs of great weakness and irregularity, which characteristics adhered to it throughout its duration. In the North-Western Provinces and Oudh, the total rainfall of June at Allahabad, Jhansi, and Bareilly was from half to three-quarters of the average: elsewhere it was only one-fourth. In the first week of the month about half an inch fell in the Benares, Jhansi, Meerut, and Rohilkhand Divisions; and towards the end of the month about two inches fell almost everywhere, except in the Agra and Rai Bareilly divisions, but not a drop was registered in Aligarh,

Compare—

{ 1782	-	-	Madras and Bombay.
{ 1783	-	-	North-Western Provinces and Punjab.
{ 1802-3	-	-	Madras and Bombay.
{ 1803-4	-	-	North-Western Provinces.
{ 1824	-	-	Madras and Bombay.
{ 1825	-	-	North-Western Provinces.
{ 1832	-	-	Madras and Bombay.
{ 1833	-	-	North-Western Provinces.

Etawah or Banda. During July the Bundelkhand district and the Agra and Meerut divisions were almost rainless; Rohilkhand, Northern and Eastern Oudh, the Benares division, and the eastern half of Allahabad received a moderate supply, mainly during the first four days of the month. There was another short period of rain about the middle of the month, distributed pretty generally, but its amount was small. Taking the Province as a whole, only a third of the average amount of rain was registered. Maiapuri alone marked no rainfall. In the first four days of August rain fell in the Benares and Allahabad divisions and in Bundelkhand, averaging about half the usual amount. In Rohilkhand and Oudh the rain was less. In Agra and Meerut the weather was extremely dry. Meerut, Aligarh, and Muttra did not register any rain. September was even drier than August. A few local showers fell in the first three days of the month, and again from the 7th to 11th, benefiting chiefly the Benares division and Bundelkhand. Not a drop was registered in Meerut, Aligarh, Bareilly, Muttra, Farukhabad, and Sitapur; and less than half an inch in Bijnor, Budaun, Agra, Mainpuri, Etawah, Etah, and Allahabad. The whole Province out of an average of 10 inches received only 2. Nor was the deficiency of rain the only affliction. Throughout July, August, and September, with little intermission except during the intervals of showers, the wind blew from the west scorching and dry, and shrivelled up the growing plants, threatening to kill even those that were constantly irrigated. October, however, was distinguished by singularly opportune rain, which, beginning at Bombay and Surat on the 4th, reached the Central Provinces, Central India, North-Western Provinces, and Punjab simultaneously on the 6th, and was heaviest on the 7th and 8th. The figures given below show each day's rain-fall, taking the average of the whole Province. Coming at a time when all hope of rain had been abandoned, in a month when the average amount gauged is only 1·70 inches, and that is due to exceptionally wet years, this downpour was of inestimable advantage to the Province, and turned to a scarcity what would otherwise have been one of the greatest famines of the century. In December again there was an unusually heavy rainfall, amounting to above three inches in Meerut, Rohilkhand, and Agra, but lessening to the eastward, till in the Benares division it was less than half an inch. Rain continued to fall in January and February, the amount in the latter month being so excessive, and so combined with damp cloudy weather, as to do much harm to the spring crops. The following table shows for each important district the average amount registered during each month compared with the actual downfall of 1877 :—

		June.	July.	August.	September.	October.	November.	December.	Total June to September.
Saharanpur	Average	3·91	12·53	9·51	4·12	0·37	0·81	0·60	30·07
	1877	-2·11	-7·73	-7·61	-2·32	+1·43	-0·41	+6·60	-19·77
Meerut	Average	3·62	9·44	6·49	3·66	0·52	0·02	0·36	23·21
	1877	-1·12	-8·64	-6·49	-3·66	+5·48	-0·02	+3·44	-19·91
Aligarh	Average	2·20	7·95	6·31	4·14	0·63	0·03	0·40	20·60
	1877	-2·20	-4·15	-6·31	-4·14	+2·97	-0·03	+1·60	-17·10
Bijnor	Average	4·12	11·45	9·32	5·90	0·43	0·07	0·31	30·79
	1877	-2·12	-9·75	-8·42	-5·40	+1·57	-0·07	+2·86	-25·69
Moradabad	Average	4·66	14·19	8·90	5·42	0·84	0·08	0·44	33·17
	1877	-3·86	-6·19	-6·20	-4·02	+6·86	+0·82	+4·76	-20·27
Bareilly	Average	5·51	14·67	8·62	6·73	1·11	0·06	0·33	35·53
	1877	-2·92	-10·97	-5·52	-6·73	+5·49	-0·06	+1·87	-26·14
Budaun	Average	3·65	10·70	8·07	5·93	0·71	0·06	0·42	28·35
	1877	-3·05	-8·20	-6·07	-5·83	+5·19	-0·06	+1·48	-23·15
Shahjahanpur	Average	5·09	11·50	7·70	6·71	1·22	0·12	0·44	31·00
	1877	-2·79	-8·90	-6·90	-4·81	+3·48	-0·02	+2·76	-23·40
Muttra	Average	2·66	9·11	7·08	4·52	0·49	0·01	0·38	23·37
	1877	-2·36	-8·61	-7·08	-4·52	+5·81	-0·01	+1·42	-22·57
Agra	Average	2·91	8·92	6·85	4·88	0·36	0·03	0·01	23·59
	1877	-2·51	-7·32	-6·20	-4·73	+3·24	-0·03	+2·14	-20·79
Mainpuri	Average	2·31	9·12	7·80	6·01	0·80	0·06	0·56	25·27
	1877	-2·01	-9·12	-6·90	-5·91	+3·30	-0·06	+2·44	-23·97
1 October 6th		-	-	-	-	0·41			
" 7th		-	-	-	-	1·35			
" 8th		-	-	-	-	1·14			
" 9th		-	-	-	-	0·35			
Total		-	-	-	-	3·25			

		June.	July.	August.	September.	October.	November.	December.	Total June to September.
Farukhabad -	Average	3.19	9.51	7.34	6.12	1.37	0.71	0.46	26.16
	1877	-2.69	-6.11	-5.04	-6.12	+4.73	-0.61	+4.64	-19.96
Etawah -	Average	2.08	8.14	8.72	5.22	1.34	0.11	0.37	24.16
	1877	-2.08	-7.64	-8.32	-5.02	+1.56	-0.11	+2.63	-23.06
Etah -	Average	1.77	9.40	7.91	4.22	1.14	0.01	0.35	23.35
	1877	-0.17	-6.70	-7.74	-4.02	+3.76	+0.09	+1.75	-18.63
Cawnpore -	Average	3.24	8.88	7.61	5.21	1.00	0.08	0.24	24.94
	1877	-2.84	-7.18	-3.91	-4.31	+2.40	-0.08	+1.76	-18.24
Allahabad -	Average	3.53	11.17	9.40	6.26	4.75	0.09	0.15	30.36
	1877	-1.03	-9.07	-3.90	-6.16	-0.95	-0.09	+0.15	-20.76
Bauda -	Average	3.27	11.24	9.80	6.81	0.86	0.19	0.17	31.12
	1877	-3.27	-9.24	-3.60	-0.41	+1.34	-0.19	+0.13	-16.52
Jhansi -	Average	4.11	12.44	10.35	5.72	0.77	—	0.22	32.62
	1877	-2.41	-11.94	-8.05	-0.32	+1.53	—	+0.88	-22.72
Lalitpur -	Average	5.01	14.08	10.49	5.81	0.79	0.03	0.27	35.42
	1877	+1.06	-12.28	-5.69	-5.01	+1.11	-0.03	+2.53	-21.92
Jaunpur -	Average	4.50	9.81	10.28	7.72	2.93	0.11	0.13	32.31
	1877	-3.40	+0.99	-3.08	-3.72	+2.87	-0.11	+0.27	-9.21
Benares -	Average	5.16	12.59	11.63	6.40	1.66	0.01	0.09	35.78
	1877	-3.76	-4.99	-2.73	-2.50	-0.26	-0.04	+0.31	-13.98
Ghazipur -	Average	4.36	10.13	9.56	6.44	2.89	0.30	0.11	30.49
	1877	-3.06	-7.63	-4.26	-5.51	-1.49	-0.30	+0.64	-20.49
Gorakhpur -	Average	6.48	12.92	11.79	8.68	2.76	0.23	0.14	39.87
	1877	-3.88	-8.12	-7.39	-5.68	+0.24	-0.23	+1.26	-25.07
Basti -	Average	5.97	15.74	11.27	9.12	2.03	—	0.16	42.10
	1877	-3.97	-13.01	-7.47	-6.62	+1.87	—	+0.34	-31.10
Lucknow -	Average	5.12	11.51	11.57	8.83	2.46	—	0.74	37.03
	1877	-4.92	-8.61	-10.57	-7.93	-0.06	—	+0.96	-32.03
Fyzabad -	Average	5.16	15.31	9.83	9.84	2.06	—	0.16	40.14
	1877	-4.06	-9.71	-7.43	-5.64	+2.14	—	+0.54	-26.84
Rai Bareli -	Average	4.50	11.90	9.31	8.61	1.68	—	0.24	34.32
	1877	-3.70	-10.00	-7.41	-7.01	+0.02	—	+0.06	-28.12
Sultaupur -	Average	6.73	13.51	11.18	8.50	2.14	—	0.18	41.92
	1877	-6.33	-8.11	-6.28	-9.80	+1.56	—	-0.08	-30.52
Sitapur -	Average	6.96	11.36	10.10	7.37	1.82	—	0.55	35.79
	1877	-3.76	-9.16	-9.70	-7.37	+2.68	—	+2.15	-29.99
Total N. W. P. and Oudh -	Average	4.72	12.01	10.12	10	1.70	—	—	36.85
	1877	2.27	4.42	3.35	2	3.49	—	—	12.04
Difference -		-2.45	-7.59	-6.77	-8	+1.79	—	—	-24.81

3. *Brief History of the Famine.*—The local government was not slow to take notice of the approaching disaster, and to warn its officers to make all preparations in their power. In August instructions were issued calling for estimates of the local food-stocks and of the crops then standing which had survived the drought. On the 22nd of August a report was sent to the Government of India describing the position of affairs; in every part of the province except the Benares division the outlook was most gloomy; in many tracts not a green field was to be seen for miles, and where the great miller crop had dried up, its stalks (which form the usual fodder of the cattle) were found to be poisonous. Emigration had already begun in the trans-Jumna districts; and unless rain fell soon, not only would the kharif be lost, but it would be impossible to sow the rabi except on irrigated land. In the beginning of September the two chief engineers were deputed to make a tour through the province to visit each endangered district, and to decide, in communication with the district officers, what works should be undertaken for relief. No work was to be begun unless it was proved to their satisfaction that there was a section of the population out of work, and unable to buy food at the prevailing rates. If this was established, they had authority to direct the opening of relief-works, choosing first only such smaller projects as would have been undertaken in ordinary course later on, or those which had for their object the immediate supply of the means of irrigation; afterwards, if these should prove insufficient, special larger works would be undertaken, and the plans and estimates of these were to be prepared. The ordinary rate of daily wage or contract pay was to be given. Poor-houses were to be opened where necessary, and takavi advances for digging wells and for seed-grain were to be given. As the result of this tour, relief-works were very generally begun in the end of September, when 27,000 persons were employed on them in the Rohilkhand, Agra,

Meerut, and Jhansi divisions. On the 4th October the Government reported again that the position was getting continually worse. The kharif was entirely lost in unirrigated lands, except in the Benares division and in the east parts of the Fyzabad and Allahabad divisions. Irrigation from wells had been but small, and that from canals had been mainly confined to non-food crops, such as indigo and sugar-cane. Great mortality existed among the cattle from want of fodder, and the prospects of the rabi were most gloomy. But the food-stocks were believed to be still large, in spite of the great export trade at the beginning of the year. Rohilkhand had about three months' supply in hand, and the rest of the country six months. Grain robberies and thefts had been very numerous, and the immigration into the Agra and Rohilkhand divisions were so large that it had been necessary to start poor-houses for the reception of these emaciated wanderers. The entire control of relief operations (subject to the orders of the Lieutenant-Governor) was placed in the hands of Colonel Fraser, the Chief Engineer, by whom a scheme of works was drafted, sufficient to employ $1\frac{1}{2}$ millions people for nine months. Just at this time occurred the fortunate fall of rain which has already been referred to, and which saved the last remains of the kharif and made the sowing of the rabi possible. This immediately brought down prices, relieved the tension and anxiety which had overspread the country, and by giving field employment to the labourers, diminished at once the numbers on the relief-works. On this great change taking place Colonel Fraser again made a tour through the province, to determine what works were required under the more favourable conditions; and it was resolved that as the necessities of the people were obviously less, relief should be given with greater strictness, tasks should be more rigorously enforced, and the wage reduced to a bare subsistence allowance. Under the influence of these rules, combined with the large demand for field labour for irrigation, the relief-works were nearly deserted in the beginning of December; but the rain which fell from the 8th to the 10th of that month, and which was most beneficial to the crops, had the untoward effect of rendering artificial irrigation unnecessary, and of stopping all field employment. The rain, too, was accompanied by intense and searching cold, which told severely on the poorer classes of population, who were all the less able to resist it, in that they had been for some time on reduced rations, had in many cases sold the thatch of their houses, or given it as food to their cattle, and were without the usual supply of straw in which they could lie and cover themselves for want of warmer clothing. In consequence of this the relief-work began to fill again; and the numbers ran up from 17,500 in December to 73,000 in February. These figures, however, by no means represented the total population that was in want of food, as the rapidly rising mortality returns testified; but it was difficult to persuade the people to apply for relief when they saw around them magnificent crops which already produced a supply of green leaves and vegetable food, such as the country people in these months ordinarily mix with their meals, and which bade fair soon to produce an abundant crop of grain. The rabi crop was sown over an unusually large area, and although much injury was done to it by the rainy and cloudy weather of January and February, the outturn was fairly good. As soon as the harvest was ripe, the relief-works emptied even faster than they had filled, and in April the numbers had fallen to 12,500. It was now hoped that the scarcity was almost at an end; and this would probably have been the case had the monsoon of 1878 set in early and favourably; but the North-Western Provinces was doomed to the same experience as that of Madras and Bombay in the preceding year. The rain again held off, or fell in local showers and with discouraging breaks; both prices and the numbers on relief again rose rapidly. The Government, however, had foreseen the contingency, and had prepared a complete and elaborate scheme of large and useful works to be put in hand in case there should be another failure of the rains. Under this scheme the works were divided into four classes. The first or most important and remunerative class provided work for $1\frac{3}{4}$ million people for 200 days, and was estimated to cost $92\frac{1}{2}$ lakhs of rupees at ordinary rates; allowing for the ineffective character of famine labour, it would of course cost more. The main works of which it was composed were seven light railways, several roads, and a partial beginning of the Sarda canal. The second class would employ 600,000 people for the same period, costing 85 lakhs of rupees; its chief component parts were the continuation of the Sarda canal, and a project for the drainage of the East Kali Nadi in the Upper Doab. In the third class the chief items were the navigation canal from Cawnpore to Allahabad, and the Betwa and Ken canals in Bandelkhand; these were to employ 370,000 people. The fourth class consisted of the completion of the Sarda canal and its branches, the West Ramganga canal (in Rohilkhand), and some minor projects. Taking all the four classes together, the scheme of works provided for the employment of 3,880,000 people, or $9\cdot23$ of the total population, at an estimated expenditure (at ordinary

rates) of $3\frac{1}{4}$ millions sterling. The scheme was generally approved by the Government of India, and sanction given to put in hand such of the works in the first section as was deemed necessary, in the order of their utility, subject to their giving the needful occupation to the population of the most distressed tracts. But it was pointed out (2nd July), that the season, though far from good, had by no means declared itself to be bad, and that there was no immediate prospect that any such heroic remedies would be necessary. In effect the numbers which had risen very greatly in July, when the rains seemed too doubtful and capricious to admit of active labour in the fields began to fall off again in August. In that month the rainfall was heavy and general though it ceased prematurely, hardly extending into September; but it secured to the country an average kharif crop, the weeding and cutting of which, together with the ploughing and sowing for the rabi, and the great need of early irrigation on account of the dryness of the soil, created an active demand for labour, and enabled the Government to close its relief works in October. The poor-houses also, which had shared in the upward tendency in July, gradually emptied, and only a few waifs and strays remained to be cared for as late as November.

4. *Extent of loss from drought, and area of severe distress.*—The estimates called for by the circular of August 16th have not been received by the Government of India; and it appears from subsequent letters of the Local Government that, being prepared at a time when the ravages of drought were still going on, they did not represent the whole of the disaster. No definite official statement has been sent up to show the extent of the loss in each district, and it is hardly possible to quantify the loss from the vague and general statements that have been made as to “nearly total failure,” &c. The area of severest distress can, however, be more clearly designated. In the Meerut division no part suffered severely; but in the southern portion of Aligarh there was some distress, owing mainly to immigration. In that district the jowar crop was estimated at one-eighth and Indian-corn at five-sixteenths of an average crop.¹ In the Agra division distress was most severe in Agra and Muttra, where the failure of rain was most calamitous (Agra had less than 3 inches and Muttra less than 1 in the 4 rainy months), and the Agra kharif crop was estimated at only 2 per cent. of an average crop.² In the Doab part of the division the failure was not so complete; and in Farukhabad most villages had some crop. But only 1·3 inches fell in Mainpuri and 1·1 in Etawah in the four months, so that nothing can have been saved except what was protected by wells and canals. In Rohilkhand the loss of the kharif was greatest in Budaun; but on the other hand that district had an extremely fine rabi crop, much superior to the rest of the division. The Commissioner³ places his districts in order thus: Bijnor the worst, then Bareilly, Shah-jahanpur, Budaun, and Moradabad. In the latter district distress was never severe. In the Allahabad division, Cawnpore and Fatehpur saved some of their kharif crop; but in Banda and in three fourths of Hamirpur it was almost a total failure. Jaunpur lost its rice, but there was no suffering there, and the whole division was very little in need of relief. Jaunpur had over 20 inches of rain, Banda 15, and Allahabad 10. In Jhansi distress was slight, though it had only 10 inches of rain out of an ordinary fall of 32, and most of the kharif was lost. The Benares division had a good deal of rain, comparatively; but all the rice in Azimgarh, Gorakhpur, and Basti was lost, and the rest of the kharif crop was only a quarter of an average. In Oudh, severe distress was confined to a central tract in the Lucknow, Bara Banki, and Rai Bareilly districts. Elsewhere it was slight; though the crops were reported a total failure in Sitapur and the western part of the country. In the Fyzabad division and the south-eastern corner of Oudh more rain had fallen and some kharif was harvested. But speaking broadly, severe distress was confined to the Rohilkhand division, Moradabad excepted, the Agra and Muttra districts, and the country lying round the tri-junction of the Lucknow, Rai Bareilly and Bara Banki districts. The first is a tract which grows much rice and sugar-cane, and lost heavily by them; the second tract is singularly dry and devoid of wells; the third is almost purely a rice-growing tract. The reports do not seem sufficiently to explain the immunity of the Bundelkhand and Jhansi districts.

5. *Numbers relieved and cost of relief.*—The following statement shows the numbers on each kind of relief for the twelve months from October 1877 to September 1878; and a more detailed table opposite gives the same information for each district. The figures

¹ Commissioner, 27th January 1879.

² Commissioner, 8th July 1879.

³ 6th May 1879.

are not quite complete, as relief was going on in September 1877 and in October 1878; but the numbers thus omitted are small.

Month.	Average Daily Number on Relief Works.	In Poor-houses.	Registered Mortality per Millc.
October 1877	32,631	2,700	15
November "	22,321	3,881	19·9
December "	17,548	6,978	27·7
January 1878	19,486	15,618	32·7
February "	73,111	29,980	38·4
March "	63,743	24,590	34·2
April "	12,444	4,252	37·5
May "	25,707	5,562	32·6
June "	104,589	9,397	28·8
July "	119,918	17,685	21·8
August "	126,824	26,351	27·1
September "	45,687	18,105	28·8
October "	—	—	33·1
November "	—	—	30·4
December "	—	—	22·2
Total number	668,688	165,049	—
Daily average number for 12 months	55,724	13,754	—
Total expenditure Rs.	16,00,317	391,895	—
Average monthly cost per head	2-6-3½	2-6-0	—

6. *Prices.*—The following table shows the course of prices during the period of scarcity. Wheat and barley alone are given as being the dearest and cheapest food-grains in common use, and it is worthy of remark how closely the prices, which in June had been so different, came together in January and February. Jowar and bajra are not quoted, because, though they appeared in the price-currents of the time, they practically ceased to exist, except for purposes of seed-grain—so absolute had been the failure of the crop. In almost every case it will be seen that prices rose rapidly from June to September, fell a little in October and November after the favourable rain; then rose slightly in January, but fell as the harvest came on, and continued to fall till May: then, as the rains held off, they rose again, till they reached their second period of maximum in July, after which they fell steadily, when the rain settled down and the kharif became assured.

	June 1877.		July.		August.		September.		October.		November.		December.		Jan. 1878.	
	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.
Meerut	25·8	38	21	31	61·4	21·8	11·8	14	13	14	14·4	16·8	13·12	16·8	13	17
Bareilly	18·12	28·12	17·8	27·8	14·6	20	9·11	12·8	11·14	11·14	11·4	13·12	11·4	13·2	10·10	13·2
Agra	20	28·15	17·5	25·1	14·4	17·12	10·8	12	12	13·8	12·8	14·8	12	14	11	13
Lucknow	20·8	29·9	18·11	27·4	15·2	20	10·12	12·1	11·1	13·5	10·14	13·4	11·8	13·4	10·2	12·8
Faizabad	19·8	28·8	17·4	24	14·4	20	11·7	14	11·11	14·3	12	13·12	11·11	14	10·14	12·9
Gorakhpur	20·2	31·8	18·6	28	14·14	22·12	11·6	14	10·15	12·4	10·15	12·4	10·15	12·4	11·13	14
Allahabad	17·12	28	16	27	14·8	22	12	15·4	12·14	16·8	11·12	16	11·12	15·4	11	15
Jhansi	20·15	29	19·15	28	15·13	19·7	11·12	13·10	13	14·11	13·8	16	13·10	13·6	13·15	13·8
Benares	17	27	15	24·8	12·8	19·9	11·15	14·11	13·11	17·5	12	15·12	12·8	14·2	11·11	14

(continued.)

	Feb. 1878.		March.		April.		May.		June.		July.		August.		September.	
	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.	Wheat.	Barley.
Meerut -	14	17	16·8	23	14·12	20·8	16·8	21·8	15·8	19·8	14·8	18	17	21	16·12	34
Bareilly -	11·4	15·10	15·10	22·3	15·15	21·1	15·15	21·14	15·5	19·6	13·7	16·4	15·5	20	15·15	21·4
Agra -	11·8	14·8	13·8	18·8	12	17·8	14·8	19	14·8	17·8	14·4	18	15·4	20	15·8	22·8
Lucknow -	10·2	13·10	13·12	20·8	14·11	20·14	14·1	19·2	14	17·11	12·11	15·15	13·5	16·15	14·10	21·2
Faizabad -	10·7	12·8	13	17·2	13·4	17·12	12·12	17·4	13·4	16·12	12·6	15	12·6	16·4	14	21
Gorakhpur	11·6	14·14	13·2	17·8	13·2	17·8	10·15	14	10·15	14	10·13	12·9	10·13	13·1	12·2	18
Allahabad	12	14·8	12·6	16·12	13	16·2	12	15·8	12·2	15·4	11·12	15	11·12	15·8	13·2	19·12
Jhansi -	11·12	12	14·2	15·14	13·8	16	13·8	19	13·1	15·6	12·13	15·7	14·10	17·2	17·14	22
Benares -	11·11	14·2	11·15	16·1	13·1	17·10	13·1	16·5	13·2	15·12	11·15	14·2	13·1	17·6	14·2	18·3

7. *Debated subjects as to famine administration.*—The subjects which have mainly come under discussion with respect to the famine administration of the North-Western Provinces have been the following:—(1) the policy pursued as to the suspension and remission of revenue; (2) the causes of the unpopularity of the relief-works in the early part of the famine; (3) the causes of the large numbers on the works in the latter portion of the time they were open; (4) the causes of the unpopularity of the poor-houses; (5) the causes of the great mortality.

8. *Orders as to suspension of revenue.*—On the 10th October the Lieutenant-Governor issued a circular on the subject of the collection of the instalments of the land-revenue which would soon fall due as the time for the ripening of the kharif harvest approached. He reminded his officers that the Principle of the settlement was to fix a moderate average demand for a long course of years, in the expectation that the deficiency of a bad year would be made good from the accumulated surplus of coming years. Remission ought, therefore, to be sanctioned only in very special cases, but suspension might be necessary. A general suspension was not called for, as in most districts some part of the crops would be saved. All zemindars who were well off, or whose cultivators had saved a portion of their crops, and generally all who could pay up, should be made to do so, and no indulgence should be shown to those who had failed to help their cultivators. But indulgence should be shown to those who had helped them, and were ready to continue to help them till the next harvest; and suspension must be granted to those who could not pay up without being reduced to such straits as to be unable to cultivate their land for the spring crop. In forwarding a copy of these instructions to the Government of India, Sir George Couper explained his views as follows:—

“If the village communities, who form the great mass of our revenue-payers, be pressed now, they will be simply ruined; whereas, if we allow temporary suspensions, there is every reason to believe that by the end of the agricultural year we shall recover all we forego now from the additional area which the people will be able to bring under cultivation, in consequence of the kharif not having been sown, and the land being therefore available for the spring sowings. . . . His Honour knows that our revenue theory is, that the people should meet the losses of a bad year from the gains of a good one. But, as a matter of fact, these prudential considerations are unknown to them. They never save. When they have a good harvest, they spend the proceeds on marriages and in other ways. . . . Well-to-do zemindars and the owners of tracts in which there has not been a total failure of the autumn harvest will, of course, be made to pay up; but well-to-do landlords are the exception in these provinces, and it is quite certain that the tracts which have escaped the calamity are few and far between.”

The Government of India replied (22nd October) that it was understood that, out of 147 lakhs of rupees usually collected in November and December, the Local Government expected to collect 99 lakhs; that the autumn crop had escaped in the greater part of the Benares and Allahabad divisions and the south-east tracts of Oudh, so that the land-revenue ought to be punctually collected there as well as in all irrigated lands even though the zemindars had refused to take canal water which they might have used. Turning to other parts of the country,—

“one crop only, and that not the greatest crop of the country, had failed on unirrigated lands. There is every prospect of a good spring crop over an unusually large area. The failure has come after two or three years of plenty, and years moreover when prices were higher than usual.”

In former cases of drought the figures had been as follows :—

1860 collections in North-Western Provinces, November, December	-	128 lakhs.
1861 " in N. W. P. and Oudh "	-	162 "
1868 " " " "	-	145 "

There was, therefore, no precedent for a general suspension of the revenue. The permanently-settled districts of the Benares province ought certainly to pay just as Behar had done in 1874. No doubt, in districts like Agra, where the failure of crops and pasturage had been excessive, or in tracts where single villages are held by cultivating brotherhoods, there would be necessity for partial suspension of revenue.

"But it would be introducing a new principle into the revenue system of the North-Western Provinces, and it would be a direct encouragement to the unthrift described in your fourth paragraph, if the Government were to suspend its demand on any great scale during the present autumn."

The Lieutenant-Governor, in reply to this on the 26th November, pointed out that the loss of the kharif had been far more general than in the case of any previous famine. Even in the eastern districts the crop had not been as good as the Government of India supposed. In Hamirpur it was estimated that only a quarter of the usual area had been sown, and the crop raised on it was about $\frac{1}{4}$ or $\frac{2}{3}$ of an average one: in Jaunpur half the usual area was sown, and the crop on it from one to six sixteenths. Fatehpur was supposed to have a five-anna crop, and Banda a two-anna crop, on half the area usually cultivated. The Benares crop was estimated at a half, and that in Azamgarh and Partabgarh at a quarter and a third of the average respectively, and that on a greatly reduced area. He further pointed out that irrigation in such a season as this had been almost in vain; and that, even if the smaller zemindars could be made to pay up, they could not do it without putting pressure on the cultivators, on whom the burden would ultimately fall. He stated, however, that instructions had been issued to correct mistaken impressions as to the probability of any general or sweeping suspensions being sanctioned, and that officers had been warned that the needs of the State were so urgent, that every effort "must be made to get in a large portion of the land revenue."

9.—*Result of what was done.*—The result of this was that, though little formal suspension was granted, much lenity was shown in collection during the months of November and December, and above 98½ lakhs of rupees were collected, against an ordinary demand of 144 lakhs, so that the province was in arrears about 46 lakhs at the close of 1877. But when the spring crop gave promise of being peculiarly fine, and it was easy for zemindars to raise money on the security of it, the Collectors began to put on pressure for the payment of the revenue; and by the end of the revenue year the arrears were only 12 lakhs of rupees, or 2·9 on the years revenue.

The collections were as follows :—

	1876-77.	1877-78.	Difference.
	Rs.	Rs.	Rs.
November to December	- 1,43,74,400	98,22,400	-45,52,000
January to September	- 4,17,80,500	4,51,40,200	+33,59,700

The question was much canvassed as to whether greater leniency should have been shown or not, and the Local Government in two letters recorded its opinion and that of several selected officers. The opinions were very conflicting. The conclusion of Government was that, if revenue and rent had been more largely suspended, the zemindars and tenants would have had more money to spend in helping labourers, but that it is very doubtful if they would have done so: they would however have been saved the necessity of borrowing at high rates. The Board of Revenue stated that it was generally agreed that the rate of mortality did not bear any relation to, or in any way depend on, the extent to which suspensions were granted, and that suspensions would only affect the landed classes, not the field-labourers or the non-agriculturists; but the number of registered deeds largely, and the number of proprietary mutations somewhat increased.

10. *Conclusion as to what ought to have been done.*—With regard to the system which should be followed on future occasions, the Famine Commission have recorded their views in Chapter III.; and so far as those views are in favour of a policy more liberal than that pursued by the North-Western Provinces in 1877-78, so far they imply a disapproval of that policy. But this does not necessarily carry with it the corollary that they consider the officers who adopted that policy blameable, or that their is no definite proof that what was done caused any serious injury to the people. The case was one of extreme difficulty; and the anticipations of the rabi crop of 1878 were much more favourable than the event justified. If less pressure had been applied in November and December,—if no collections had been made in January to March till the spring crop

was actually harvested and its character known, and if then as much of the arrears as was possible had been got in, it is probable that as much leniency would have been shown as it was proper to show under the accepted revenue policy of the Province. The result would apparently have been that the arrears at the close of the year would have been somewhat larger, but the zemindars would have been less heavily in debt, and the Government revenue, though delayed, would not have been imperilled.

11. *Reluctance to come to relief-works in first period of famine.*—The next point requiring consideration is the reason why so few people, comparatively, came to the relief-works in the early period of the scarcity. When attention first began to be drawn to the great mortality, it was asserted in some quarters that the cause of it was that the insufficiency of the wage drove the people away from the works; and the Lieutenant-Governor, in a minute written on the 23rd April 1878 to rebut this charge, showed that the wage given, $1\frac{1}{2}$ annas for an adult male, had been sufficient to purchase an ample ration of food, and that the reason why more people did not come to work was an unexplained reluctance. In 1837, he said—

“People beset the house of the European residents in thousands, begging for the food which they had not to give, and for want of which the poor sufferers lay down in numbers and died in their compounds. All former experience has shown that the people are willing enough to come forward themselves when really in want. . . . Nothing of the sort took place this year.”

The Government of India in reply admitted that the question was a difficult one, and that the same reluctance to work had been shown elsewhere, and referred the matter for the consideration of the Famine Commission,

12. *Main reason: prospects of the rabi crop.*—The main explanation is no doubt that which is given in the Administration Report of the year¹ :—

“Prices, though high, were not at famine rates, and a certain amount of food was procurable near their homes. The fields yielded a bountiful supply of green vegetable food, with which every year in the cold weather they eke out their existence; and this they consumed in large quantities, finding to their cost that, though hunger was allayed, their strength was not supported.

So, too, Mr. Edwards, Commissioner of Rohilkhand, wrote² :—

“The people welcomed the ‘sag’ and other herbs that sprang up after the October rain, never doubting that, mixed now and then with a little meal, it would support them till the rabi had begun to ripen. . . . As the rabi approached maturity, the hopes of the people rose. The crop was magnificent: it spread over an unusually large area, and afforded so ready a means of relief to the starving that, long before it was ripe, pilfering had become general, and every field had its one or two watchmen prepared to resist to the death all attempts at theft. Many a broken head resulted and not a few lives were sacrificed; but these were nothing to the numbers who died from gorging themselves with the unripe grain.”

The gram especially and the mustard plants were unmercifully picked; and this partly explains why the former crop turned out so badly. Distress became more severe when the rain in December stopped the field-work. The numbers did then mount up very very rapidly, though they were far less than could have been accommodated on the works opened, and less than the number who really needed relief. But the people could not believe in starvation with a fine crop ripening before them, and believed they could manage to exist somehow till the harvest came. After it was cut, and as long as the prospects of the kharif were doubtful, there was no such reluctance shown to accept employment on relief-works.

13. *Second reason: harsh management of relief-works.*—Another cause must be mentioned to which weight has to be given. It is impossible to resist the conviction that the relief-works at first were harshly and badly managed. The new or Bombay policy was introduced, and the works were placed under professional supervision, but the policy was not carried out to its full extent, by making the Public Works Department officers understand that the works were for the people, and not the people for the works. The Collector of Muzaffarpur reports³ that :—

“the ordinary method of executing works is by petty contract; and it was laid down at the commencement that the works were to be carried out strictly in the ordinary manner.”

And contractors were not bound to furnish work to all comers, but could select their men, and would not select the weak and emaciated. The same system was adopted in the district relief-works in Etah and Etawah, as well as on the Lower Ganges canal in Mainpuri,⁴ and also in the Agra District, and with the same results. In Rohilkhand the Commissioner writes⁵ that :—

“work was at first rigorously exacted by Public Works subordinates, who looked solely to the work done and its cost, and seldom troubled themselves about the object with which the works had been started.

¹ p. XXXI.

² 16th May 1879, paras 5 and 12.

³ 14th December 1878, paragraph 6.

⁴ Commissioner, 8th July 1879, pp. 5 and 6.

⁵ 6th May 1879, paras. 19, 22.

. . . The work was at first given out in petty contract, and the views of Government defeated; but this was soon discovered and remedied. It was, however, a more difficult task to make the subordinates of the Department Public Works understand the real object of the works and their duty with respect to the labourers. For a time they exacted the same work from the weak and strong—from the beldar and from the man who had never before done a day's earthwork; a Native overseer in the Department Public Works has no more bowels than a hyena."

This is strongly put, and it might probably be replied that a native overseer in the Public Works Department is like a native in every other department: he follows the cue set him by his superiors, and does not strike out a line of his own. The main cause of this error seems to have been that the Chief Engineer did not warn his subordinates beforehand against the danger of too much severity, and that civil officers were not instructed that they should supervise the management of relief-works (in all but professional details), and that the collector must be in this, as in other respects, the head of the district administration. The one officer who appears to have understood this necessity and to have assumed the responsible position that was properly his, was the collector of Bijnor, Mr. A. Colvin. He had, perhaps unwisely, cut down the wage to an anna per adult male, or 2 annas per 100 cubic feet, thinking that, as in 1861 and 1868, the people would crowd to the works, and that it was necessary to keep off those not absolutely in want. But when he found out the difference in the temper of the population, he raised¹ the rate to 3 annas, and gradually to 6 annas per 100 cubic feet; and having thus tempted the people to come to the works, he then began to reduce it again, and to enforce discipline and order, issuing at the same time orders that all emaciated wanderers on the road should be compulsorily detained and sent to relief-works or poor-houses. Other collectors may have taken similar steps, but it has not been reported; and it is on record that many considered that they had no right to interfere at all with the management of relief-works. So little were the respective duties and powers of the different classes of officers defined, that it is reported that one district engineer refused to receive on his relief-works, and actually turned off persons who were sent in by the civil officers as urgently in need of relief, preferring to endanger their lives rather than lower what he considered to be his own position.

14. *Third reason: hope of relief without work.*—There is also a third cause alleged for the refusal to work, which is said to have been due to a change in the temper of the people, who claimed to be fed for nothing. They are reported to have said:—"In former famines of less severity Government supported us and required nothing of us, how is it that in this great famine we are required to work?" It is difficult to see how this idea can have grown up. As far as our records go it is clear that in 1861 and 1868, relief was nowhere given without work; and though no doubt the work done was often inadequate, there was no want of pressure and insistence upon it. Possibly the rumour of the lavishness of relief in Behar in 1874 may have spread over the country, and led the people to expect the repetition of that great blunder. But it seems more likely that these phrases were used only as phrases by men who did not feel sufficiently starved to force them to work. This was Mr. A. Colvin's opinion in Bijnor. He relates how some gangs demanded a wage of 2 annas a day, and no measurements, and on refusal marched off in a body; and how men employed by a Raja at 1½ annas a day insisted on spending every other day in idleness in their villages. "This general wish to be fed well and do little shows a capriciousness which is not the child of misery."

15. *Reluctance fully explained.*—These considerations lead pretty clearly to the conclusion which should be adopted, and show that the reluctance of the people to come to the relief-works was nothing wonderful. The distress was not very severe, for food was not at famine prices, and even those who had no money with which to buy and no credit to pledge were buoyed up with the hope that they could live off the growing crops and that the ripening of the harvest would put an end to their troubles. The works were managed at first with inconsiderable harshness, and obtained a bad reputation. Employment in the fields was abundant till December, and the numbers on relief-works fell from 32,000 to 17,000. When field labour ceased, they rose rapidly to 73,000 in February, and fell again to 12,000 in April, when the harvest was being reaped. The connection between cause and effect is as close and natural as can well be conceived.

16. *Cause of crowding into works in latter period of famine.*—The next debatable question refers to the sudden rise of the numbers on relief-works in July and August—a rise which has been attributed to the injudiciously high rates of wage imposed by the orders of the Government of India. When the numbers began to rise again in May, the North-Western Provinces Government compiled the instructions which had been

¹ Commissioner's report, 6th May 1879, p. 8.

² Commissioner's report, 6th May 1879, p. 8.

issued from time to time into a Famine Code, and sent it to the Government of India, which approved it with some few exceptions. One of these related to the relief wages. The previous orders had been that the rate should be such as to provide a sustenance for all (the sustenance being ten chittacks of wheat flour and two of dal for a man), and should not exceed $1\frac{1}{2}$ annas for a man, 1 anna for a woman, and $\frac{1}{2}$ anna for a child; and this scale was adhered to in the Famine Code. The Government of India, however, preferred the plan, which was followed in Bombay, of fixing two rates—one to be paid to those who performed a higher task, giving a margin above subsistence; and the other a strictly subsistence wage for those who performed a less task; and they also prescribed a minimum below which wages should not be ordinarily cut for short work. The scale was as follows:—

	Special Gangs (emaciated).	Ordinary Gangs doing 75 per cent. of a full Task.	Minimum Wage below which Reduction should not go.
Adult male - - -	12 chtk. flour + 9 pie	10 chtk. flour + 9 pie	10 chtk. flour + 3 pie
Woman or big child - -	10 chtk. flour + 6 pie	8 chtk. flour + 6 pie	8 chtk. flour + 3 pie
Working child - - -	6 chtk. flour + 3 pie	4 chtk. flour + 3 pie	4 chtk. flour + 1 pie

These rates were introduced into most parts of the North-Western Provinces and Oudh between the 20th and 31st of July, and continued in force till the last week of August, when they were withdrawn on the representation of the Local Government, that they were universally thought to be too high, and that as rain had fallen plentifully and employment was abundant in the fields, and the prospects of the kharif were good, the time had come for making preparations to close relief. The question of the working of these rates of wage has been separately discussed in a note appended to this sketch; and it has been shown that in the case of the thirteen works for which statistics were obtained, in only two was there any coincidence between the rise in numbers and the enhanced rates. In one case the enhanced rates were not given; in three, rates higher than the prescribed ones were given; in four cases the numbers fell in spite of the enhanced rates; and in three more the wage actually paid, owing to fines for short work, were less than had been paid before. Looking at the figures for the whole province,¹ it is evident that there was no very great increase in the numbers, and what there was was largely due to the opening of new works. The "Mat canal" work in the Agra district, which was begun in August, alone employed 15,000 people daily during that month, and more than accounts for the entire increase.

17. *Relaxation of task work.*—From papers received since the appended note was written, it appears that the fixing of a minimum rate was generally misunderstood. The object of that rule was to prevent persons who failed through weakness to perform their allotted task from being paid proportionately to the amount they had done, and so having their wage reduced below the minimum necessary to support life. The impression seems, however, to have got abroad that the intention was to discourage tasking altogether. Thus the Commissioner of Rai Bareilly, Mr. Lane, wrote² that these orders—

"seem to have done away in a great measure with the value of any test. When all comers were admitted, and men could get enough to live on by doing the smallest amount of work, it was not to be expected that they would exert themselves much to get the slight increase allowed by the maximum rate. . . . Are men to be supported who can work and won't? If they are to be paid a bare subsistence wage, how is some return in the shape of work to be got from them?"

So, too, the Commissioner of Lucknow, Colonel Reid:—

"Even among the lower castes there was never anything like a rush to the works, except during the brief period when, injudiciously as we all thought, the task test was held in abeyance."

It is sufficient, perhaps, to point to the example of Bombay, where the principle of a minimum rate was adhered to, but the task test was not held in abeyance, and on the contrary better work was obtained than ever was got before from famine coolies. Task-work, in which there is a maximum rate but no minimum, would be piece-work with all its evils and none of its advantages. It is essential to fix a minimum rate, for otherwise those who are feeble would be slowly starved because of their feebleness; but reliance should be placed on active supervision and pressure in compelling them to do their best, and on the stimulus of a higher wage held out as a reward for those who do a larger

¹ June, 104, 599. July, 119,918. August 126,824.

² 14th March 1879.

task. No doubt this misconception had something to do with the increase of numbers in some districts; but, on the whole, it must be pronounced that there was no such increase as to cause alarm, or to necessitate especial enquiry into its cause. As soon as the rain began to fall steadily, the numbers decreased rapidly, and the people hastened back to more congenial employment in their fields.

18. *Causes of unpopularity of poor houses.*—The poor-houses were managed in all cases on the principles laid down first in Moradabad in 1861, and adopted afterwards in 1868 and 1874. Cooked food was given to all applicants on the condition of residence within the enclosure. The numbers were never large, the maximum being 26,000 in August. After the scarcity was over, reports were received from many quarters of thier extreme unpopularity. Three officers in particular confirmed this, who were specially deputed to enquire into the causes of the mortality. Mr. Benett wrote that though it was usually thought a sufficient precaution to provide a Brahmin to cook the food, this was not so. The cook must be known to the people, and known to be a man of good character.

“A tahsildar sent out a messenger to bring in a colony of 14 Ahirs and Lodhs whom he knew to be starving at a village a few miles off. They said they would die rather than lose their caste. And a week later two miserable old men crawled in saying that all the rest had died, and that, being left alone, they had no longer the spirit to resist the food that was so near them.”

Mr. Roberts states that loss of caste was occasionally the result of entering the poor-house. Captain Pitcher writes :—

“Everywhere I found in the village the practice of excommunication from caste resorted to by all castes except two (Chamars and Sweepers) against those people who went to the poor-houses. Poor-houses will never be more popular than they are now, until Chamars and Bhangis are relegated to separate enclosures.”

These reports are entirely opposed to the opinion which has hitherto been current, that the conditions of residence in a poor-house, and of cooked food, are tests severe indeed, but not too severe for the purpose of keeping away unworthy applicants. Colonel Baird Smith reported in 1861 that the system was highly approved by all the native members of relief committees. No objection to it was raised in 1868, or in 1874. It has been the deliberate conviction of the most experienced officers in the North-Western Provinces, that though cooked food is disliked, everyone who is starving or in the extremity of hunger would overcome that dislike and would accept it if offered him. Were those officers mistaken, or have the present reporters been misled by exaggeration, or has a change come over the feelings of the people, or was there any difference in the system of management of the poor-houses?

19. *Attempt at explanation.*—These questions do not, I believe, admit of any very definite replies, but to some extent a certain amount of light can be thrown on them. In the first place, there is no doubt that the extent of the mortality in previous famines was concealed from us, as it would still be but for the registers of deaths; also we know more of the process of chronic starvation, and are aware that in all severe famines many people will stop at home, in a vague hope of the impossible, till they are too weakened to apply for, or to be saved by relief, however liberal and unburdened with conditions. Acute starvation at a particular stage will probably drive a man to accept any food offered him, but chronic starvation leads often to apathetic resignation, or causes diseases for which there is no remedy. So far then it is not true to say that no one will die rather than go to a poor-house. Many will put off going there till it is too late. On the other hand it seems possible that the stories told after the scarcity was over would have been told after the close of previous famines, had similar opportunities been given. In other parts of India it has been observed that the very people who crowded to the relief-centres expressed the utmost horror of them afterwards, and denied having gone there. Captain Pitcher's most strenuous deponents were in the Bareilly district, of which the Commissioner reports that the people flocked to the poor-house, though they refused to have anything to say to the relief works, and they had to be turned out and sent to work by force. Thirdly, as to the caste question, there is no evidence whether people were or were not put out of caste before. No special enquiry, as far as is known, was ever made on the subject; but the Hon. Sayyad Ahmed states that he never heard of its happening, and if that is the case it shows that some change of feeling has passed over the minds of the people at large in respect of this mode of relief. It must not be supposed, however, that the fact of being put out of caste is a very terrible thing among the lower classes; it merely implies a small expenditure and a dinner. But it is worth considering whether on future occasions native public opinion could not be influenced through its leaders in such a way as to make people feel that it is base and cruel to punish socially those who are

compelled by want to accept food in this way. After the Orissa famine the Puudits of Calcutta and Cuttack issued notices declaring that paupers, who had partaken of government cooked food under the pressure of hunger had committed no fault, and that it would be a sin to put them out of caste. Lastly, the management of the poor-houses seems to have been in all respects the same as in previous years. Sayyad Ahmad states (*vide* his memorandum), that he has heard of mismanagement, but perfect management of such institutions can hardly have been attained in former years; and there is much evidence as to the great care that was bestowed on them in many places. Mr. Edwards writes of the Bareilly Poor-house which accommodated 5,000 paupers:—

“No pains were spared in making it what it should be. Separate blocks were allotted to Thakurs, Muhammadans, Chamars, &c., and every care taken to avoid interference with caste prejudices.”

Drs. Townsend and Planck, who were deputed on a special tour to examine these establishments, reported decidedly in favour of the way they were managed, though, as was natural, they found some faults to correct.

“The Poor-houses, as a rule, were well looked after. At Agra, Rai Bareilly, and Basti, the arrangements were excellent. At Lucknow and Bareilly the accommodation was insufficient, and there was great overcrowding. At Muttra the inmates were well looked after; but the mistake had been made of occupying several separate buildings in different parts of the town, instead of collecting the paupers in a garden or tope outside. At Muttra also, through fear of expense, the kind of food was not suitable for people greatly reduced and debilitated. In other places it was invariably good and well cooked. The distribution of the food was also carefully supervised, and nowhere had we reason to suspect that the inmates did not receive the full ration prescribed. The ration usually given consisted of eight chittacks of wheat atta, and 1½ of dal to adults, with salt and condiments; and, so far as I was able to judge by inspection of the inmates, this ration was sufficient for subsistence, and the weakly and emaciated (provided diarrhoea had not come on) recovered flesh and strength under it. In this opinion the medical officers generally agreed; and both at Agra and at Basti numbers had so far recovered under this ration as to be considered fit for transfer to the work.”

It is possible, however, that on future occasions some use might be made of Mr. Bennett's suggestion for administering relief of this kind exclusively through native agency, so as to avoid the prejudices aroused by a poor-house managed by Europeans.

20. *Extent and nature of the mortality.*—With regard to mortality, I can hardly do better than refer to the notes on the mortuary statistics, and on the special inquiry into the causes of mortality, which are appended to this sketch. The facts may briefly be summed up thus. In the fourteen months, November 1877 to December 1878, the deaths registered were 1,721,652 against an average number (at 20·2 per mille of 990,747, giving an excess of 730,905; and if it be accepted that the actual usual number of deaths in ordinary years is about 35 per mille (of which only 20·2 are registered), and that the same deficiency went on in 1877–78, then the real ordinary number in fourteen months would be 1,716,640, and the actual number of deaths between November 1877 and December 1878 was 2,983,060, or an excess number of 1,266,420. Of the usual causes of death, cholera alone was less active than usual. Small-pox and fever were most virulent and fatal, and a great number of deaths were attributed to bowel-complaints. The special inquiry brought out the following as its most important results:—

“That the effect of relief-works, where they were large and numerous attended, is traceable, though not very clearly, in a diminished mortality; that in one tahsil in Oudh where the landowners behaved with remarkable liberality, their exertions, coupled with the Government relief measures, went a long way to enable the people to resist the losses by drought; . . . that the classes who suffered most were the field-labourers and rural artisans—after them the town artisans; while the cultivators escaped with little, and the landlords with no, loss of life.”

21. *Suggested summing up as to North-Western Provinces famine administration.*—The question how far mortality is preventible in any great famine has been discussed in my sketch of the Bombay famine of 1876–77, and my views need not be repeated here. But, as far as regards the North-Western Provinces, the Government of India have called on the Famine Commission to pronounce an opinion regarding the administration of relief in the North-Western Provinces, and whether to any defects therein the great mortality of 1878 is attributable. I submit, for the consideration of the president and members the conclusions to which I am led by an examination of such imperfect data as, in the absence of any provincial report we have before us. It seems to me that the principles on which relief was administered were perfectly sound and correct, but that there were a few errors and omissions in details which it may be well to point out for future guidance, though not with the intention of conveying censure, since all plans and arrangements are liable to correction in the light of the fuller knowledge of later events. The relief works were sagaciously planned, were sufficient in number, were opened in

due time, and were wisely put under professional supervision. But the relations between the Civil and Public Works Department officers were not clearly enough defined; the paramount authority of the collector was not laid down; enough care was not taken to instruct the subordinates as to the temper in which they should act, and the manner of carrying on relief works; and sufficient activity was not shown in supervising the works to see that orders were properly obeyed. The chief engineer, who was in charge of all relief operations, should also have had authority over poor houses, so as to see how the respective numbers fluctuated, and a system of weekly returns should have been initiated from the first for the same purpose. The belief that the government had to deal with a scarcity, not with a famine, was a correct one; and it was right to discourage panic and to restrict relief to those absolutely in want. But if collectors and commissioners had been more alive to the duty of seeing that what was being done was done well, it is probable that most of the irregularities in detail which were detected by Drs. Townsend and Planck, and again by Mr. Cunningham, would not have occurred. It is doubtful whether, even under a perfect system, a larger amount of relief could have been given in November, December, January, and February than was given, while that given in June, July, and August was, if anything, larger than necessary, not less, and was partly due to an unfortunate misunderstanding with the Government of India. The Local Government cannot therefore be held in any way chargeable with the mortality that occurred, since it is held that no relief that could have been administered on any sound and reasonable system (apart from errors in detail which have been noticed) could have availed to prevent it.

22. *Attempt to estimate the loss by Famine.*—It was observed in para. 4 that the data for making a complete detailed estimate of the loss of the kharif crop hardly exist; and yet it seems desirable to make such an approximation as is possible, considering how essential it is, in order to estimate the resisting power of the people, to calculate the extent of the strain they had to bear. According to the paper on agricultural statistics, the ordinary production of the province in an average kharif harvest is as follows:—

Crop.	Acres.	Outturn in maunds.
Jowar - - - -	4,976,500	36,278,600
Bajra - - - -	3,364,000	21,361,400
Rice - - - -	2,505,000	28,035,000
Macai - - - -	846,000	9,585,000
Small millets - - - -	819,000	5,733,000
Pulses - - - -	1,000,000	7,000,000
Arhar with cotton - - - -	—	6,938,000
Total - - - -	13,510,000	1,14,931,000

Now the indications reported as to the produce of the crop in 1877 (in paras. 4 and 8) may be summed up thus. In the Meerut and Agra divisions hardly any kharif had been saved except in irrigated lands, and of that but little was sown with food-grains; in Rohilkhand, Sitapur, Lucknow and Jhansi divisions, and in the Bundelkhand districts of Allahabad, and in Rai Bareilly the failure was almost total; it will probably be safe to put the outturn in these parts down as one-eighth of an average crop. In the rest of the Allahabad, Benares, Rai Bareilly and Fyzabad divisions the loss was less tremendous, but it was very heavy; and these districts contain about one-third of the total cultivated area of the province: in Azimgarh, Gorakhpur and Basti the rice was entirely lost, and the rest of the kharif was a quarter crop, in Jaunpur it was reckoned to be hardly more than an eighth of an average; in Benares about a quarter, in Pictabgarh about a sixth, altogether it can hardly be reckoned more than a quarter of the usual outturn. If then the harvest amounted to one-eighth in two-thirds of the province, and one-fourth in one-third, it amounted to one-sixth of an average over the whole province; the outturn was therefore 19,155,000 maunds, and the loss was 95,776,000 maunds, or 3,420,000 tons, which at Rs. 50 per ton amounts to 171 millions of rupees or 17 millions sterling.

THE MADRAS FAMINE.—1876-1878.

Authorities [Review of the Madras Famine; Note on the Temple Wage; Resolution of the Government of India, June 1882. Moral and Material Progress Reports, 1876-77, 1877-78.]

Brief History of the Famine.

THE troubles in Madras dated as far back as the summer of 1875. The Presidency depends for its harvests on the south-west monsoon in summer, and on the north-east monsoon in autumn. In 1873 and 1874, the seasons were good, and, though unfavourable reports came in from 11 districts during the summer of 1875, prices generally kept low and steady. In Bellary, however, the south-west monsoon was an entire failure, and relief-works on a small scale were authorised as early as October. With 1876 the reports became more ominous. They attracted the attention of the Government of India, and the Government of Madras called for more detailed information.

As the summer months went on, it became clear that the south-west monsoon had again failed over the Dekkan plateau, and severe distress showed itself in the districts of that region. The numbers on the relief-works increased, and prices rose with alarming rapidity. By October 50,000 people were engaged on relief-works in Bellary alone, and over Rs. 3,00,000 had been spent generally on wages before the close of that month. Coarse rice was selling at 7 and 8 seers per rupee, and ragi at between 8 and 10. Moreover, when the time came round, the autumnal proved as scanty as the summer rains. In Nellore the rainfall was less than 2 inches against an average of 21; in Chingleput it was about 4 against 24; in Trichinopoly 3 against 14. The foodstocks in the country were unusually low, and the cattle died off for want of fodder, and fever began to make its appearance. Things grew steadily worse from the autumn to the end of the year, by which time at least a million labourers were on the relief-works, and prices had risen still further. Gratuitous relief had also begun on a large scale. The earliest months in 1877 were marked by an intensity of the sun's heat, which completely burnt up the already parched country. The distress reached its maximum, and the number relieved either on the works or gratuitously, touched its highest point. As summer advanced prices declined a little, but the south-west monsoon, though it did not entirely fail, was short and fitful. Towards autumn the outlook became more desperate than ever, in view of the possibility of the north-east monsoon again proving deficient. The Viceroy visited Madras to confer with the Governor on the necessity of a larger scheme of relief-works; but scarcely had this been organized when a capious north-east monsoon, accompanied with violent storms and floods, removed the worst apprehensions. At the end of November the number of persons in receipt of State relief had fallen to 675,000, and at the end of December to 470,000.

Prices, however, were high and fluctuating throughout the earlier part of 1878, and this circumstance produced a recrudescence of distress in certain districts. Up till July there were still 200,000 persons on the hands of the State; but the summer and autumn rains were abundant and well-distributed, and prices settled down gradually. The number of applicants for relief decreased in proportion, and by December of that year the Government felt justified in closing all relief-works.

Area and Population of Famine Tract.

The Madras Presidency is divided into 21 districts; 14 of these were affected more or less by the famine, forming an area of 83,000 square miles, with a population computed roughly at 19 million. In only seven¹ of these, however, was the famine really severe for an extended time. With the exception of the sea-board districts of Nellore and Chingleput, all these are grouped together in the centre of the Presidency to the east of the Ghâts. Taken together their total area came to 52,862 square miles, with a population of 10,024,104 at the census of 1871. In Bellary, Kurnool, and Cuddapah, the usual difficulties were enhanced by the proximity of the districts to the Nizam's territory, and the consequent immigration. Chingleput and Nellore were fortunately accessible by sea, and received supplies of grain in this way. The other group of districts is traversed by the Madras Railway, which connects them on the north with the Great Indian Peninsula line, and in the south with Madras port. Another branch of the line runs south-west from Madras to the Malabar coast, through Salem and Coimbatore. The main line of communication with the inland districts was therefore tolerably complete, although the carrying power of the railway at times proved inade-

¹ Bellary, Kurnool, Nellore, Cuddapah, Chingleput, Sa

quate, and the subsidiary roads and wheeled carriage were often defective. The northern districts of the Presidency entirely escaped the drought. In the extreme south the failure of the north-east monsoon of 1876, brought Madura, and, to a less extent, Tinnevely, into the list of famine districts, and, towards the close of 1877, the high price of food and the number on relief-works in the former district, indicated severe distress. Large stocks of grain were thrown into it from Tanjore and Negapatam by the South Indian Railway, which thus played a very important part in the scheme of relief. Between August 1876 and December 1878, the Madras Railway carried nearly 1,000,000 tons of grain, and the South Indian Railway nearly 400,000 tons, into the distressed districts.

Action of Madras Government.

The attitude of the Madras Government in the early months of 1876 was one rather of vigilance than decision. The first relief works on a small scale had been sanctioned for Bellary in the previous August. With the Spring of 1876, provisional relief-works, also on a small scale, were sanctioned for Cuddapah, Tinnevely, Chingleput, and South Arcot. By August the real character of the distress had become apparent, together with the inadequacy of the provincial funds. An application was consequently despatched to the Government of India for assistance from the Imperial funds, and also a proposal to start relief-works on an extensive scale, in order to concentrate the scattered labour. The particular undertaking suggested was the embankment of the Bellary-Guddak railway. Pending the reply, the Madras Government found itself confronted with a threatened insufficiency of the food supply. In October arrangements were made for forming a grain reserve, and Messrs. Arbuthnot were instructed to hold 30,000 tons of grain for Government. Further operations in the same direction were in contemplation, but were disapproved after a correspondence with the Government of India, as calculated to interfere with private enterprise, which appears to have been extraordinarily active. Towards the end of the same month the expected reply to their proposals was received by the Madras Government. Looking to the critical state of the finances, and the possibility of the situation improving, the Government of India declined to sanction large and expensive relief-works, and recommended the prosecution of local relief-works. To the organization of these attention was therefore directed. Accordingly, at the end of 1876, there was a large scattered system of petty relief-works, employing about a million labourers.

These, again, were found to be very inefficiently supervised. Orders were, in consequence, issued at the beginning of the next year, placing the subordinates of the Public Works Department at the disposal of the civil officers to supervise works, and directing the executive engineers to assist them. No action was, however, taken to give effect to these orders till the end of April.

Deputation of Sir Richard Temple.

In the beginning of 1877, the full gravity of the situation impressed itself upon the Government of India, and Sir Richard Temple, as an officer acquainted with their views, was deputed on a special mission to visit the residencies of Madras and Bombay, and to communicate personally with the two Governments on the subject of Famine Relief. He arrived in Madras on the 14th January, and left on April 24th, during which time he submitted a number of minutes and memoranda to the Madras Government, many of which were acted upon. The first thing that engaged his attention was the overcrowding on to the relief-works. Applicants for relief were thereupon subjected to a more stringent examination. Following on this, a stricter system of village inspection was established. The existing rate of wages was also reduced, and money wages were generally substituted for payment in grain wherever this prevailed, the rate being adjusted according to the price of food. Extensive public works were opened for the employment of large numbers of able-bodied labourers under professional superintendence, and arrangements were made for bringing gangs on to them from distant localities. Moreover, in addition to the strict scrutiny of applicants for relief-work, the population already occupied on it was examined, and any persons who showed no real sign of want were at once excluded. Various causes prevented these measures being carried out with full success; but their effect was immediately visible in the diminished numbers on the works.

The Temple Wage.

The previous wage paid on the relief works, 1½ lb. of grain and 3 pies for an adult, was reduced in January, at the strong recommendation of Sir R. Temple. The allowance was fixed at 1 lb. of grain and ½ an anna for an adult under ordinary circumstances, the ½ anna being raised to an anna when the works were under the Public Works Department. It will not be necessary to give the arguments in favour of either rate of wages, as they are discussed in a separate note on the effect of the Temple wage in Madras or Bombay in this volume. Only the history of the different changes in the rate will therefore be sufficient. On the 1st March the Sanitary Commissioner of the Presidency, Dr. Cornish, officially protested against the reduced grain ration, as insufficient to keep the people in health. A conference was held, at which Sir R. Temple was present, and though the Government determined to give the lower rate a further trial, some slight modifications were introduced. The reduced scale, however, appeared to tell heavily on persons already weakened by long privation, and in May the Government so far reverted to the old scale as to increase the ½ anna to 1 anna per diem on all relief-works where the tasks were not less than 50 per cent. of a nominal day's work.

Gratuitous Relief.

The beginning of 1877 brought the Government face to face with another difficulty, the enormous increase of gratuitous relief. This was largely occasioned by the summary reductions of numbers on the relief works, which in many cases simply transferred people to gratuitous relief, and also by the lower scale of wage. In January 80,000 persons were being gratuitously relieved. Two months after the introduction of the new wage the numbers had risen to 300,000, and in June they reached 491,949. Meanwhile the labourers on the relief-works fell off between January and April from 900,000 to 674,000. In administering gratuitous relief, those who were unable to work were at first collected in closed relief camps, where cooked food was given out. But eventually Government considered that this system fostered much unnecessary and aimless wandering, besides being opposed to the instincts of the people. Accordingly district officers were allowed in May to grant relief to the destitute in their own villages, instead of removing them to a relief camp, and a money dole given through the village headman was substituted for the cooked food. There was a hesitation in preferring village relief to central poor camps in Madras, because it was feared that the Government had not sufficiently strong inspecting agencies at command to prevent such relief being gratuitously obtained by many who ought to have been subjected to a labour task. This apprehension found expression in a minute by the Viceroy on the 12th August: "It is the inevitable tendency of all gratuitous relief afforded by the State, if it be not supervised and restricted with the most scrupulous exactitude, to intrude injuriously on the field of labour relief, and thus demoralise large masses of the population." At that time the average daily number of persons gratuitously relieved in the Madras Presidency was 1,131,000, of whom nearly half were the subjects of village relief, and the other half were resident in relief camps. The number of labourers on the relief works in August 1877 was 919,912, of whom only one-fifth were employed on large works under professional agency; and the monthly expenditure on famine relief of every kind had risen to the immense sum of 49 lakhs.

System of Relief re-organised, August 1877.

In August 1877 the south-west monsoon again failed, and the aspect of affairs became so menacing that the Viceroy undertook a journey to Madras to confer with the Governor. Before leaving he elaborately reviewed the situation in the minute quoted above. The chief points dwelt on were the defective carrying power of the railways, the inutility of the works on which the majority of the relief labourers were employed, the enormous numbers in receipt of gratuitous relief, the necessity for a large scheme of public works of lasting utility, and the intention of the supreme Government to place at the disposal of the Local Government the engineering and supervising staff required for this purpose. Again the cumbrousness of the existing administrative machinery was insisted upon, and it was determined to concentrate the whole famine administration in the hands of the Governor himself, assisted by a high officer, General Kennedy, in the confidence of the Supreme Government. Relief works on a large scale, and mostly under personal supervision, were made the backbone of the system; village relief was confined to the old and

house ridden, who were clearly incapable of labour. Relief camps were also retained, but on the understanding that the inmates, if they regained strength, would be transferred to work of a light nature under civil management, and thence to the larger operations under the Public Works Department. But the system of relief had scarcely been re-organised on this sound and economical basis when the rains of the north-east monsoon fell abundantly and dispelled the most serious apprehensions. By the end of November the number in receipt of relief fell to 675,000, by the end of December it had fallen below 500,000.

Famine Expenditure.

The total net expenditure incurred from the beginning of the famine till March 1880, amounted to 630 lakhs, allowing a credit of 30 lakhs for excess railway receipts, and of 26½ lakhs for grain recoveries. The heaviest expenditure fell in 1877-78, the figures for that year being more than 440 lakhs.

To this must be added the loss of revenue which is estimated at over 191 lakhs. The total loss therefore entailed by the Madras famine cannot be put down at less than 8¼ millions sterling. Three and a half millions of this were spent upon relief works which might have been productive. But the value of the work done, if estimated at the normal rates, was not more than one and a half millions. The reason for this result is to be found in the great number of petty works which were started, and to the inefficient supervising agency at the command of the Government until the latest stages of the famine were reached. Among the important works undertaken, the earth-works of the Bellary Hubli Railway, and the Buckingham Navigation Canal are conspicuous. Some large tanks were also excavated and repaired. The annual expenditure during the three famine years on relief works and on charitable relief is here contrasted.

—		1876-77.	1877-78.	1878-79.
		Rs.	Rs.	Rs.
Charitable Relief	- -	11.01.936	159.21.953	8.27.847
Relief Works	- -	94.94.369	230.54.463	—

(Madras Famine Review, Appendix P.)

Money Advances.

A satisfactory feature of the Famine Administration is to be found in the money advances made to the distressed population. Rs. 3.80.900 was advanced for the purchase of seed grain and Rs. 14.19,000 for the construction of wells and tanks under the Land Improvement Act. Of these 18 lakhs, less than one lakh is considered to be entirely irrecoverable. The policy of employing artizans, when applicants for relief in their own occupation, which, under certain conditions, has found a place among the recommendations of the Famine Commission, was also adopted. Twelve lakhs were advanced to the weavers, and were nominally recovered in the shape of cloth woven by them. A considerable stock however was left unsold, on which a certain loss must be incurred. But there is no reason for supposing that the labour of this population, had it been employed on the ordinary relief-works, would have proved more profitable.

Loss of Land Revenue.

The problem of estimating the loss of land revenue assignable to the famine is made very difficult in Madras, where the ryotwari system obtains. The ryot being at liberty to resign the whole or any part of his holding, the occupied area and the revenue on it necessarily fluctuate from year to year.

Again, the demand, when settled, is liable to reductions on account of remission of revenue made under the ordinary rules, and finally the reduced demand may not be realised in full, and the balances have to be struck off. But, keeping these considerations in mind, the following table will yet furnish a general illustration of the effect produced by the famine on the area held under the ryotwari settlement.

Year.	Occupied Area.	Percentage cultivated.	Land Revenue Remitted.	Net Demand.	Collections.
	Acres.		Rs.	Rs.	Rs.
1875-76 - -	20,021	87	38,94,609	3,46,12,214	3,17,09,251
1876-77 - -	19,956	71	1,07,72,439	2,72,90,801	1,81,35,986
1877-78 - -	20,009	78	38,88,867	3,50,68,670	2,40,67,242
1878-79 - -	19,904	79	29,41,278	3,61,67,558	2,94,11,186
1879-80 - -	19,171	81	31,43,694	3,54,57,141	3,04,37,387

It will be seen from these figures, first of all, that the occupied area did not shrink to any great extent on account of the drought. The people clung to their holdings, and the area leased to ryots in 1877-78 was practically as large as in 1875-76. The drought, however, affected cultivations severely. In the year before the famine, 87 per cent. of the occupied area was under cultivation. In 1876-77 the proportion had fallen as low as 71 per cent., or in other words very nearly $3\frac{1}{2}$ millions of acres had gone out of cultivation. Naturally the amount of remissions corresponded to this, and in the same year 107 lakhs of land revenue were struck off the gross demand, while the actual collections showed a proportional decline. In 1877-78 remissions were granted much less readily, and the net demand for the last three years taken has been up to the average of normal years. The actual collections, however, have not experienced a similar recovery.

The revenue charges of the permanently settled and other estates are more easily dealt with, because in normal years the revenue is less subject to fluctuations. The net demand on the whole land revenue of the Presidency, after the usual remissions have been made, averages 450 lakhs. In 1876-77 the net demand fell to 365 lakhs, or 85 below the usual amount. The year ended with an outstanding balance of 140 lakhs, of which over three were afterwards remitted. In 1877-78, the demand rose to 447 lakhs, of which 313 were collected, and the outstanding balances came to 183 lakhs in all. In 1878-79 the current demand was 461 lakhs, and 370 were collected. But $134\frac{1}{2}$ lakhs were also realised on account of the outstanding arrears, and $1\frac{1}{2}$ were remitted. In 1878-79 the year began with outstanding balances estimated at 138 lakhs, and the current demand was fixed at 454 lakhs. By March 1881, all except $24\frac{1}{2}$ lakhs had been collected of the current demand; 99 lakhs of arrears had been got in, and three were remitted. The total balances outstanding at that time aggregated $60\frac{1}{2}$ lakhs, of which 36 were due to arrears between 1876-79. The Madras Government then wrote off $11\frac{1}{2}$ lakhs of this standing balance, and finally the remaining $24\frac{1}{2}$ were remitted under the orders of the Secretary of State for India in Council.

To sum up, including the diminished land revenue of 1876-77 and succeeding years, the arrears written off at different times, and the large remission ordered by the Secretary of State, the total loss of land revenue due to the famine and the consequent impoverishment of the people, cannot be set down at less than 150 lakhs or $1\frac{1}{2}$ million sterling. In addition to this there is the decrease experienced in the excise, salt, and miscellaneous revenue. Thrown together, the various items bring up the total loss of revenue to a round sum of 191 lakhs.

Difficulty of Collections.

The land revenue, moreover, was not collected during the famine years without recourse to coercion. The large increase in the number of forced sales and other severe processes, and the decreasing area under occupation in Salem and other districts, point to the difficulty the Madras ryot encountered in satisfying the demands of the State. These questions eventually formed the subject of correspondence between the Government of India and the Secretary of State.

It will not, however, be necessary to advert to it in this history, further than to record that the Government of India finally expressed a conviction¹ that a more certain and self-working method of relief should in future be introduced into the revenue system of the Presidency, which should minimize the risk of aggravating the distress of the agricultural population by harsh measures of collection.

¹ Resolution of the Government of India.

Mortality.

The mortality caused by the famine is a complicated and difficult problem. There are three sets of data on which calculations may be founded. A comparison of the population, according to the census of 1871, in six distressed districts, with the population given by the test census carried out in 1878, a comparison of the population in 1871 with the numbers given by applying the test census to the entire area affected by famine, and, finally, a comparison of the census results of 1871 and 1881. Into all these enters the question of the average annual increment of the population, which has been variously estimated, and several minor considerations.

Taking the first set of data, the test census of 1878 comprised the whole of the Salem District, one taluk in each of six very distressed districts, one taluk in each of three slightly distressed districts, and one in Tanjore, where the crops had been saved by irrigation. In Salem the population was returned at 1,599,896 against 1,969,995 in 1871, thus giving a decrease of 107,099.

The population of the six taluks of the west districts had similarly decreased from 871,061 to 739,989, while that of the four remaining taluks showed an increase ranging from 6 to 9 per cent. The total apparent loss in Salem and the six distressed districts amounted to 538,161. But this takes no account of the doubtful rate of increase. The Madras Government at first assumed it to be $1\frac{1}{2}$ per cent. per annum. The accuracy of the computation was immediately challenged by General Kennedy, who contended that there was no evidence to bear it out. General Kennedy's arguments, however, were vitiated by his assertion that the limits of cultivation had been reached in Madras in 1871, the steady yearly increase in that year and in the fifteen previous years notwithstanding. He also laid great stress on the loss of population due to migration. But the emigrants appear to have been generally attracted home by the large donations of the Mansion House Fund for rebuilding and re-cultivating purposes. Nevertheless, the rate of $1\frac{1}{2}$ per cent. seems too high. But if it is accepted, then the total loss in Salem and the six distressed districts would have been three-quarters of a million instead of 538,161.

Secondly, in a Memorandum of 20th June 1878, the Sanitary Commissioner of Madras, Dr. Cornish, applied the results of the test census to the whole famine area, taking a lower annual increment of 1 per cent. Proceeding by this method, which was necessarily conjectural to some extent, he estimated the whole loss to the Presidency at not less than three million lives.

Finally, the results obtained by the decennial census of 1871 and 1881 may be compared. In 1871 the population was returned at 31,597,872. In 1881 it was 30,389,181, and it must be remembered that every successive census improves in accuracy, and comprehends sections of society not before enumerated. There is reason to suppose that this was peculiarly the case with the Madras census of 1881. The decrease in the ten years was three-quarters of a million, while in the period between 1851 and 1871 the census returns show an advance from 22 to $31\frac{1}{2}$ millions. Nor, of course, does the simple decrease at all represent the actual loss, as there is little doubt that the normal rate of increase, whatever it was, would have been maintained during the decade.

District returns abundantly confirm this conclusion. In the following two statements the change in the population between 1871 and 1881 is given (A.) in seven districts that totally escaped the famine; (B.) in the ten districts on which the calamity fell heaviest.

STATEMENT A.

District.	Population in		Increase in 1881.
	1871.	1881.	
Ganjam - - -	1,520,088	1,548,696	28,608
Vizagapatam - - -	2,159,190	2,363,277	204,078
Godavery - - -	1,592,939	1,792,866	199,927
Kistna - - -	1,452,374	1,548,507	96,133
Tanjore - - -	1,973,731	2,140,585	166,854
South Canara - - -	918,362	959,020	40,658
Malabar - - -	2,261,256	2,333,853	72,602

STATEMENT B.

		Population in		Decrease or Increase.
		1871.	1881.	
Nellore - - - -	-	1,376,811	1,220,335	-156,476
Cuddapah - - - -	-	1,351,194	1,120,118	-231,086
Bellary - - - -	-	1,668,006	1,339,763	-328,243
Kurnool - - - -	-	959,646	711,557	-248,083
Chingleput - - - -	-	938,184	985,554	+ 47,370
N. Arcot - - - -	-	2,015,278	1,817,561	-197,717
Salem - - - -	-	1,966,995	1,599,425	-367,570
Coimbatore - - - -	-	1,763,274	1,658,567	-104,707
Madura - - - -	-	2,266,615	2,167,381	- 99,237
Madras Town - - -	-	397,552	409,117	+ 8,565

In only two of the 10 districts, Madras and Chingleput, has population increased at all. It has fallen off in all the others. Bellary, Salem, Kurnool, where the distress was most intense, show the heaviest loss. In 1871 the population of these three districts was over $4\frac{1}{2}$ millions; in 1881 it barely exceeded $3\frac{1}{2}$. In Salem, moreover, the cultivated area has decreased by one-quarter since 1875, and the district officers attribute this decrease to the mortality among population and cattle in the famine period.

The corrected estimate in the Madras Census Report of 1881 puts the total loss of population even beyond Dr. Cornish's more conjectural computation after the test Census, while assuming a lower annual increment. Taking this at 0.795 per cent. for the $9\frac{1}{4}$ years after the 1871 Census, but allowing for an estimated deficiency in the previous returns of females and floating population, and for the loss by balance of emigration and immigration, there appear to have been $3\frac{1}{2}$ millions of people missing in 1881.

NOTE ON THE PRACTICAL EFFECTS OF THE REDUCED OR TEMPLE WAGE IN MADRAS, AND OF THE CORRESPONDING RATE IN BOMBAY.

SECTION I.—MADRAS.

[The materials for this note are (1) the Parliamentary Blue Book, Vols. II. and III., (2) the proceedings of the Famine Department of the Government of India, (3) a file of papers, proceedings of the Madras Government, sent by that Government to the Famine Commission as containing all the information in their possession on this subject, (4) Notes of Evidence taken by the Famine Commission, (5) Annual Report of the Sanitary Commissioner, Madras, for 1877.]

ON the 19th January 1877, in his Minute No. VII., dated from Cuddapah, Sir Richard Temple wrote as follows¹ :—

“ 7. Now, the present rate of wages is fixed as two annas per diem for an adult, and proportionately lower for women and children. This rate is fixed upon the supposition that it will purchase one and a half pounds of grain per diem, a quantity which is deemed essential for a man while at work. There might indeed be a question whether life cannot be sustained with one pound of grain per diem and whether Government is bound to do more than sustain life. This is a matter of opinion; and I myself think that one pound per diem might be sufficient to sustain life; and that the experiment ought to be tried. Possibly the gangs might not perceptibly fall off in condition. After a week or fortnight of experience it would be seen whether they so fall off or not; if they were to seriously fall off, then the point could be considered. It is to be remembered that, when these poor people first came on relief, their condition was low, and they needed very full rations. Such rations have been allowed for some time, and the people are in very good case. A reduction might now be demanded in the interests of financial economy and might be attempted for a time at least without danger; at all events the trial might be made for people at task-work, and especially with those who are not really at task-work, and who, though nominally at some sort of task-work, are doing very light or nominal work. One pound of grain ought to be made to suffice. At the present prices, a rate of one anna and a half would purchase a pound of grain and would leave a small margin for condiments, vegetables, and the like. It may be that Government would be willing to allow more than a pound a day of grain if its financial means permitted; but the demands of economy seem to require that at all events a trial should be made as to whether a pound a day might not be made to suffice for the one purpose which is admitted, namely, the staying off of danger by starvation.”

2. On the 22nd January he followed this up with a further Minute No. XIV.,² answering, by anticipation, the objections which might be raised against it, and urging that as the present number of relief labourers in the Madras Presidency was about 1,200,000, their monthly cost was about 30 lakhs of rupees, and a reduction of the wage from 2 to 1½ annas in the case of an adult male would cause a saving of 7½ lakhs of rupees per mensem. The objections he anticipated were from—

- (1.) That 1½ annas per diem will not at present prices purchase sufficient food:
- (2.) That it will not sustain the people in robust health:
- (3.) That it will not enable a man to perform task-work with all his strength:
- (4.) That a reduction will make the relief labourers discontented, and tempt them to rioting.

To the first objection he answered as follows :—

“ 4. As regards the first objection: at a price of eight seers a rupee for common food-grains 1½ anna will purchase one pound avoirdupois of grain, and will leave a margin for vegetables and condiments. Experience has shown that, though this may not be a large ration, still it will sustain life. In prosperous times the peasantry perhaps eat more, but even in ordinary times it is probable that the poorest classes in many parts of India do not really get more, so much is this the case that in many parts of India half a seer a day, meaning one pound, has passed into a proverb for bare subsistence. I submit that, in such an emergency as this, to give more than such subsistence is beyond the power of Government. Nor can it be said that a man ought to receive more than 1½ anna per diem bare subsistence, because he has to feed those dependant on him; for, as a matter of fact, under the relief system, not only the man, but the wife and children, also receive wages.”

To the others his answer was that a very few weeks would show whether signs of physical depression began to manifest themselves among the labourers; that the task would be lowered according to their strength, it being out of the question to give high relief wages merely to get a high degree of task-work; and that there could be no rioting if only those were admitted to the works who were in absolute need of assistance.

3. On the 31st January,³ the Madras Government accepted this suggestion and issued a resolution which stated that the defective organization of relief-work which had at first existed had been remedied and the supervising staff increased—“ the Government there-

¹ Blue Book II., 39.

² Blue Book II., 56.

³ Famine, A. Progs., India, February 1877, No. 88., page 190.

fore deem it imperatively necessary to require more systematic and economical administration than hitherto." "Influenced by these considerations and the obvious expediency of maintaining a uniform standard of State relief in adjacent provinces," the following rates of wage were laid down:—

I.—Under supervision by the Public Works Department, or where task-work, not less than 25 per cent. below ordinary task-work, is enforced.

For a man—the value of 1 lb. of grain, plus 1 anna.

For a woman—the value of 1 lb. of grain, plus $\frac{1}{2}$ anna.

For a boy or girl— $\frac{1}{2}$ lb. of grain, plus $\frac{1}{2}$ anna.

II.—Under non-professional supervision, and where not less than 50 per cent. below ordinary task is enforced.

For a man—the value of 1 lb. of grain, plus $\frac{1}{2}$ anna.

For a woman—the value of 1 lb. of grain, plus $\frac{1}{4}$ anna.

For a boy or girl—the value of $\frac{1}{2}$ lb. of grain plus $\frac{1}{4}$ anna.

"All officers entrusted with the administration of relief operations * * * are very carefully to observe the result of its introduction, and to report weekly till further notice, or immediately, if urgently necessary, the result of this reduction of wages more particularly as regards the physical condition of the people."

4. On the 13th February,¹ Dr. Cornish, Sanitary Commissioner, wrote objecting to the reduced wage, on the ground that 1 lb. of grain and half an anna could not supply enough indigenous nutriment for a man's support. The Government of Madras, 1st March, circulated this letter, in order to warn all district officers of "the importance of the duty confided to them of watching the tentative reduction of subsistence allowance," and directed all civil surgeons to report weekly, after the introduction of the new rate, whether they could detect any loss of power or flesh in the coolies.

6. Paragraph 15 quoted above refers to a Minute of the previous day (6th March)² in which Sir R. Temple proposed that children under seven should get half the rate of working children. On the 16th March³ he telegraphed that the Madras Government had ordered a month ago that children should receive special relief, and that "this is being carried out." The papers before me do not enable me to trace the date of this order.

7. Somewhere about this time an order which I have not yet been able to trace was issued allowing or directing that the wage laid down in Scale II. should be given for seven days in the week although the labourers only work for six.

8. On the 7th March the Government of Madras invited Sir R. Temple by telegram to come to Madras to discuss the question of the reduced rate which they thought of abandoning in consequence of receiving unfavourable reports as to its insufficiency. The discussion was held, and the Madras Government,⁴ in deference to Sir R. Temple's arguments, resolved to await reports from other districts before deciding on the adequacy or otherwise of the wage. It was said, however, in the resolution, dated 15th March that—

"There is no doubt, in the opinion of His Grace in Council, from the perusal of the reports already received, as well as from the personal observation of members of Government, that many persons are

¹ Famine, A. Progs., India, March 1877, No. 66.

² Blue Book, III., 247.

³ Famine, A. Progs., India, March 1877, No. 68.

⁴ Famine, A., Progs., India, March 1877, No. 94.

⁵ Famine A. Progs., India, March 1877, Nos. 83 to 84.

to be found in gangs, who are failing in strength either from insufficient nourishment or from other causes. This may arise from their having been previously weakened by insufficient or bad food before coming to the works, or from their having been in bad health, or, again, from the task of work exacted from them being too heavy, having regard to the sustenance given. His Grace in Council, therefore, directs the special attention of all collectors and divisional officers to these predisposing causes. Any persons found in working gangs whose appearance indicates failing condition shall be at once withdrawn from such gangs and placed to some lighter work, or if, on any large work, such persons are found to be numerous and no relief-camp be sufficiently near, they shall be placed together in a special gang and given such additional allowance as may be found necessary, to maintain their health and strength. Where the members of a gang generally show signs of physical deterioration it may indicate that the work has been too great, the allowance of food too small, or possibly that they have not received the full benefit of the allowance granted, either in consequence of malpractices on the part of industries and overseers, or because they have dependents living upon them, and sharing their bare subsistence allowance, whose wants should have been discovered and relieved, if necessary, by the village officers."

"4. * * * One part especially must never be overlooked, but which has, it is feared, received insufficient attention in some places, namely, the regularity and frequency of payments of wages. With good method and system, daily payments, should be the rule whether in cash or in grain."

9. On the 3rd of April, Sir R. Temple¹ wrote a Minute forwarding the reports made by Dr. Townsend, Sanitary Commissioner to the Government of India, regarding his inspection of famine coolies in the districts of Bellary, Cuddapah, and North Arcot. The detailed results of these inspections will be noticed afterwards. Sir R. Temple says—

"I am able to say that Dr. Townsend's views of this important matter coincide with mine, which have been formed after inspecting nearly 200,000 people under relief in Southern India. And my impression is that the majority of the civil officers, the relief officers, and the engineering officers, employed in supervising relief operations in the Madras Presidency, hold the same views. Yet these officers are in no way wanting in thoughtful consideration of the people, or in energetic care in watching their condition. Of the senior civil officers, Mr. Price, the Collector of Cuddapah, is the only one who has, to my knowledge, reported an opinion that the reduced relief wage is generally inadequate. But that view is not borne out by Dr. Townsend's inspection of some gangs at or near Cuddapah. And from my own knowledge of the relief gangs in that district, I should not be disposed to concur with the collector."

Dr. Townsend's report, dated 3rd April, on the result of his tour of inspection, wound up thus:—

"Taking the evidence that has come before me in the course of my tour, I can arrive at no other conclusion than that the rate to which the wage of the relief labourer was reduced on the recommendation of Sir Richard Temple is sufficient to support them in fair condition, provided that care is taken that the individual recipient is the only person who is supported on it. And I see no reason why the wage should be raised unless an equivalent amount of work is performed."

10. On the 6th April, Dr. Cornish wrote² in answer to Sir Richard Temple's Minutes of the 7th and 14th March (the latter of which has not been mentioned above, because it dealt only with the physiological side of the argument, and as this note is only intended to recapitulate what can be learnt as to the practical results of the wage all such discussions are omitted). In it he dwells on the difficulty of conducting an experiment as to the minimum wage under the existing conditions.

"Our relief-works are scattered over many thousands of square miles of country; they are but indifferently supervised, and in no instances are the native supervisors qualified to test the results of any special system of feeding or payment as regards the health of the people. To record the results of such an experiment with the accuracy required, it would be essential to weigh every individual of a gang; to enter their names and weights in columns, and to repeat the weighing week by week for a period of several months; to note also the condition of each individual, week by week, as to anemia, pulse, tongue, heart's action, muscular power, &c. An 'experiment' of this nature might be carried out, as regards a few persons under the constant observation of a medical man, aided by careful assistants; but it is obvious that the results on a large scale, according to the tests proposed by Sir Richard Temple, could never be ascertained. Sir Richard Temple does not seem to be aware of the fact that 'a week or two' of low living, while doing much mischief, might still give no results measurable by the eye or by weighing."

"There is nothing more remarkable in connection with these famine relief-works than the sudden changes and fluctuations in the personnel of gangs. The people inspected one day may be away the next. The people falling ill and unable to work are replaced by others, and there is never any certainty that two inspecting officers, going over the same ground, within a short interval of time, are seeing the same people. Any comparison of their observations or reports, therefore, can scarcely be gone into profitably, while this uncertainty exists in regard to the identity of the individuals composing the gangs."

In the close of his reply, referring to Sir Richard Temple's expressed opinion that "with very few exceptions the general physical condition of the labourers is as good now as in ordinary years," he speaks of the miserable state of those fed in relief-houses

¹ Blue Book III., pp. 317-325.

² Ibid III., p. 333.

and by private charity, and adduces the great mortality registered in all the famine districts as showing that the general condition of the population is far below par.

11. In his minute¹ dated 18th April, Sir Richard Temple replied that there is no analogy between the condition of the people in relief-houses, and in the districts generally, and that of relief-labourers. If the people die in the villages and in the relief camp, that shows that they stay away from relief too long, and either die in their village, or apply for help too late, in other words, that the system of village relief is in fault—not that the wage on relief-works is insufficient.

12. At last, on the 22nd May,² the Government of Madras decided that the reduced wage (Scale No. II) must be given up, “the weight of the direct evidence being” “decidedly adverse to the continued maintenance of the lower rate.” Scale No. I was made “of general application to all famine-works, the task to be exacted being not less than 50 per cent. of a full task estimated according to the physical capability of the individual labourer in his normal condition.” “Labourers unable to perform this amount of task should not be in the labour gangs at all, but should be on specially light work or in a relief-camp.” Full rates were to be paid for Sundays, but no work exacted; children under seven years old to get 3 pic a-day, and wages to be paid not less frequently than once in three days.

13. On the 29th June,³ the Government of India said that it was important “for financial and other reasons, to know the numbers who have been at various times on the reduced or lower scale of wages,” and asked for statements showing for each taluk the rate of wages paid in each successive week from January 27th to May 26th, inclusive, with the number of men, women, and children in receipt of the same. On the 9th July⁴ (1877) the Madras Government promised compliance with this request, but the statement has not yet been submitted.

14. I now take up in order the notices I find regarding each district in the file of proceedings sent me by the Madras Government, in answer to my request that they would favour the Famine Commission with a statement of the information the Government had before it when it decided that the reduced rate was too low and must be raised.

I.—BELLARY.

10th March.—The collector reports that the new rate came into force between the 15th and 20th February in most cases;⁵ there has hardly yet been time to observe the results of the change. Mr. Glenny, sub-collector, has seen no change in condition, nor has the deputy collector, Bellary Division, nor Mr. Howe, who has been in charge of relief-works round Bellary, since 27th February. On one road where there were 7,000 coolies he found 400 or 500 physically unfit; but it is not known if they came in that state to the work or not. The ½-anna to infants is a great boon, and it is hoped the parents will now recover strength.

2. 19th March.—Collector forwards reports of subordinates: has not noticed any deterioration himself, but it may be going on all the same. Narsing Rao, temporary deputy collector, says (10th March) the Tahsildars report no change; but one of them would prefer 2 annas for a man's wage. Mr. Glenny (10th March) does not think the condition has deteriorated: the gangs look poorer on an average than they did a month ago, but that is due to the elimination of the conspicuously well nourished. Mr. Howe, (13th March)—the people continue in good condition; the relief camps are attracting from the work the weak and emaciated who are quite unfit for labour.

3. On the 26th, 27th, and 28th March, Dr. Townsend inspected different gangs, nearly 13,000 at Adoni and 10,000 at Bellary. At Adoni it was found that no Sunday wage was given except to the inefficient gangs: a few people were emaciated, but they were always found to be supporting some relative from their wage, or to have fever or some disease. The allowance of 3 pic for infants had not been distributed to the full extent intended by Government. A large gang who had refused to work at a distance of 10 miles, and applied to be admitted again to work near home, were in good case. Near Bellary a party of 7,500 were employed in breaking and stacking metal; the task

¹ Blue Book-III, page 304.

² Famine A Progs., India, June 1877, No. 78, p. 812.

³ Famine A Progs., India, July 1877, No. 30.

⁴ Famine A Progs., India, August 1877, No. 70.

⁵ Sir Richard Temple says (22nd March, page 509 famine file)—grain wages ceased about 26th February in Bellary.

Dr. Cornish, who apparently was with him at the time of his inspection, wrote on the 8th May regarding the visit:—

“The Honourable Sir Richard Temple had at Goondakal, on the 24th April, picked out 41 men from a gang of 180, who, from weakness and omaciation, were obviously unfit for work, and whom he considered should be fed at a relief-house without work. Of these persons, so far as could be ascertained, only 12 had recently come on the works, the remainder having been present for two or more months. In addition to those 41, I noted 18 others who, in my opinion, were in very feeble condition. As, at a previous inspection on 23rd February 1877, Dr. Harvey, Sir Richard Temple’s medical attendant, specially comments on the fine physique of the Goondakal gangs, the only inference I can draw from the fact is, that, to quote Sir Richard Temple’s own words, the men had been getting thinner and thinner, and weaker and weaker, till at last they have had to be drafted off to gratuitous relief-camps as unfit for work.”

7. 25th April.—The collector states that the sub-collector, head assistant, and deputy collector of Anantapur, see no change: two other deputy collectors think the people are falling off sadly. He forwards these reports. Deputy collector Venkatachellam says (17th April) “it is a known fact to all natives that half a seer of grain is hardly sufficient for a Single meal for an able-bodied coolie” (*i.e.*, for half a day’s food); that the coolies are falling off in strength and growing depressed in spirits; 92 deaths have occurred in one party since the new scale was introduced. A special deputy collector says women eat more than males, and require better nourishment, and their wage ought not to be less than a man’s. Both the Deputy Collector, and the two Special Deputy Collectors under them, give a sad account of the condition of the coolies. The Deputy Collector of Bellary writes, 18th April—

“No less than 2,080 coolies have come under my observation, not mere inspection, and I must say that the result has not been encouraging.

“The female coolies outnumber the male beyond all proportion, and the bulk of them are of low physique, many adults and broods of young children looking pale and lank. The grown-up women, though of middle age, when their way at work, (*sic*), and some of their infants strolling about the place passing for miserable moving skeletons. The mothers complain that the anna allowed to each of the children is not enough to buy sufficient nourishment for it, the pittance paid to themselves scarcely sufficing to buy them a good day’s meal. Considering, therefore, the amount of exhaustion resulting from exposure to the burning sun of April and May, and the discouraging indications of the process of wastage among the relief labourers, I would respectfully suggest a gradual increase to the present rates of wages until such time as we could detect a change for the better in their physique.”

8. On the 27th and 29th April the Collector wrote again, saying that Mr. Oldham had (on the 21st April) raised the wages in the Adoni Taluk (except in the town of Adoni) to 2 annas for men, 1½ for women and 1 for children; giving the wage for six days only, except to inefficient gangs, and the Sub-Collector Mr. Glenny had raised wages in his three taluks 3 pies all round. Asks leave to give the higher scale all over the district. The reasons given by Mr. Oldham (21st April) are that increased pressure is visible in the condition of the labourers and the time for relaxation has come.

“This pressure is chiefly due to the advancing season and the time the people have been on the works. But there are other causes. The price of grain has risen and is rising, and sometimes it is not easy to get on the remoter works, while at places distant from Adoni the price fluctuates greatly. The evening storms which now frequently occur interrupt payments and cause much inconvenience to the labourers camped on the roads. Their clothes are getting very ragged. The great heat, at a time when they are not compelled to work, is trying; and the recruiting for Nellore has undoubtedly pressed very severely on the adult male labourers.

“In fact it is among the latter that the change is visible, and this accounts for the apparent disproportion in the new rates. The women still look much as before, as no direct pressure has been put on them to go to Nellore. Many of them are in excellent condition, sleek and fat. This cannot be said of any of the men.”

Mr. Glenny (21st April) considers that the people are decidedly thinner than they were.

The Board sent on this reference (7th May) saying that there is a strong concurrence of testimony showing that the rates are quite insufficient:—

“And the Board cannot but think that there is a very serious risk in continuing the lower rates now in force. They seemed to have failed wherever they have been fairly tried; for in many places where the new scale is said to have produced no ill effect, either the coolies have had the advantage of being able to purchase a cheaper grain than that taken as the standard, or they have been able to earn wages for the higher scale of task-work.

“The lower rates are probably now beginning to tell with severity on weakened frames exposed to great heat without any, or with very inadequate, shelter. A continuance of the present experiment may lead to great disaster.”

The Government on the 17th May sanctioned the raising the rates generally in the district to 2, 1½ and 1 anna, and said “orders on the subject of a general raising of the wages rate in the distressed districts will issue separately.”

9. Collector, 3rd May.—No deterioration seen by Deputy Collector of Anantapur. Dr. Williams inspected two gangs and found signs of defective nourishment generally, which indications an inexperienced eye could not perceive. Two other Deputy Collectors report that the coolies are getting weaker.

10. 7th May.—Collector reports that on 3rd May the Deputy Collector, Harpanhalli, raised the wage to 2 annas for men, &c.

11. 15th May.—Collector to Board. Mr. Glenny observes deterioration in condition of labourers in Alur and Gooty, and has raised the wage 3 pic all round, but wishes this not to be considered an increase but as payment for Sunday. Two Tahsildars report deterioration; other officers do not. Mr. Glenny's letter, enclosed, dated 28th April, says, in Tadpatri the condition of one-fourth of the people on the works has been discovered to be so exuberantly good that it is clear the elimination of unworthy recipients has not been carried out. These last three letters reached the Government after the Order of the 17th May and the General Resolution of May 22nd had been issued.

12. In his evidence before the Famine Commission Mr. A. F. Cox said as follows:—

"At the end of December I was sent to Bellary, and returned here in March. I saw the Temple ration in force then; the people seemed to be getting on perfectly well, and I thought it quite sufficient. There were a large number of people on a great number of works, which I was constantly inspecting. The people always complained of the wage, but I did not think there was any good reason for complaint. I did not inspect any one work constantly, so as to be able to notice and depose to the progressive condition of the people on the ration. I saw no falling off as long as the ration lasted, and others agreed with me, such as the Collector and Mr. Kitts; and I remember no one who held a different opinion. There was considerable mortality from diarrhoea both on the works and in the villages; it continued equally when the ration was increased. There was very little water, and people drank from filthy stagnant pools. Dr. Cornish never came to inspect any of my gangs while I was here. I should not have advised Government to make the changes in the ration, judging from the state of the gangs under me."

13. It appears that the reduced wage never had a fair trial in Bellary, as the orders were never properly carried out, the Sunday wage not being given; that the Collector was from the first doubtful, and that most of the Native Deputy Collectors were very hostile to it; that the European officers thought well of it till the latter part of April, when they too declared against it; but that no evidence exists that the progress of the experiment was ever carefully watched and followed in the persons of the same individual labourers, still less that any weighments were made. Moreover, the arguments used by Mr. Oldham (paragraph 8) should have led on to raising the rates all round, but to greater care that the rates were proportioned to the prices of food on *the spot*, and to an order that the labourers should get full wages even if on wet days they were unable to work.

II.—CUDDAPAH.¹

3. *6th March.*—Dr. Cornish reports a visit of inspection made on the 3rd. Out of a gang of 900 persons employed close to the town of Cuddapah, he found signs of defective nutrition, (*i.e.*, want of fat, looseness of skin, and flabbiness of muscle) in about 75 per cent., signs of anæmia in about 50 per cent., and a peculiarly sad, drawn expression of face, indicative of distress and bad feeling in about 25 per cent.

"In regard to the effect already produced by the reduced scale of wages, there has not been sufficient time to arrive at any definite conclusions. For the first effects of a reduced wages scale we must look to the condition of the old and infirm and the young children, that is, to the *dependents* of the labourers who are incapable of earning a living for themselves, and who have to subsist on the portion of food that can be spared by the bread-earners. These classes are not to be seen on the relief-works. If we desire to know how it fares with them we must seek for information elsewhere.

"The people, although they do not refuse the wages or decline work, are tolerably unanimous in their expressions that the wage is insufficient to give them their food and to keep up their strength, and this opinion is very general also amongst the native officials, who understand the habits and customs of the people; and amongst the European officials whom I met there was no doubt at all as to its insufficiency. The practice in force here is to pay once a week; but with so small a wage, and with so many hungry recipients, I think it should be paid every second day at least."

4. *12th March.*—Collector forwards reports by Mr. Cox, Special Deputy Collector, Bailwail Taluk, dated 8th March. The revised scale of wages is greatly affecting the physical condition of the people, though he cannot assert it is doing so to such an extent as to endanger life. Observes that the wage is fixed according to prices at taluk headquarters, whereas prices on the works are generally dearer. Collector adds—

"Mr. Cox's experience is of one full week.

"I would respectfully urge the discontinuance of the present scale of wages, which I feel assured will, no matter what precautions are taken, end in disaster.

"The coolies down here (the letter is dated from Pullampett) were on Saturday, for the first time, paid the reduced wages. I inspected over 2,000 this morning. They, as a rule, looked by no means in good condition, and their complaints were incessant. There can be but little doubt as to what their condition after a fortnight upon the existing wages will be."

5. *19th March.*—Mr. MacCartie, Special Assistant Collector, reports on coolies in Cuddapah Taluk: condition of men unchanged, but some of the older women show signs of deterioration. The reduced rate has stimulated emigration to Nellore, the ragi harvest has furnished the men with ample work, but these women and children have flocked to the works in inconvenient numbers.

"No harm has yet been done owing to the concurrent harvest, but there is no doubt that the present scale of rations will reduce the people very much during the ensuing three months, and so render it difficult to exact the full task.

"In my opinion it would be good policy to raise the scale to the purchasing power of 1½ lb. of grain for each adult with 3 pies for condiments, which appears to be the minimum on which they can work continuously without losing strength."

6. *24th March.*—Dr. Cornish reports the results of a visit to Madanapilly,¹ the sub-division of Cuddapah. Inspected about 3,000. Their wages had been 2½ annas per man and were reduced to 2 annas six weeks ago.² The "Temple" wage has not been introduced at all: from one-third to one-half of the coolies inspected "bore distinct evidence of bad living." "About 50 per cent., though still able to work, were not so well nourished as in ordinary seasons, and rather more than 30 per cent. showed decided evidence of distress and privation which, if not arrested, will most certainly lead to diseased conditions and premature death." Has told the Sub-Collector Mr. Gribble³

¹ On the 1st and 2nd February Sir Richard Temple had visited this sub-division and recorded the following remarks.

"Sir Richard Temple inspected several gangs of relief labourers in and about Madanapally, in all some 3,000 or 4,000 persons. He found that the labourers looked to be in good condition; and it appeared that some proportion of them must have been quite able to support themselves, for a time at least, without Government aid. Hardly any of them appeared to be in a physically reduced condition. Some of them bore on their persons evidence in the shape of good clothes or ornaments that they had not yet been reduced to extremity. The Sub-Collector was of opinion that some of these people could with safety be dismissed from the works, and he anticipated that when the Madras Government orders should be received he would be able to reduce and in future keep down the number of relief labourers."

² This appears to be not quite correct, as the coolies were paid in grain for some time. *Vide* Sir Richard Temple's minute quoted above, para. 7.

³ With reference to this, Mr. Gribble's evidence before the Famine Commission may be quoted:

"The Temple ration was introduced in the beginning of March in all cases except this gang, which Dr. Cornish reported on so unfavourably, and in which I refused to introduce it in consequence. This gang eventually got into the relief camp in April, where the ratio of deaths was 2,000 per mille. I remember a gang at Volikul, inspected carefully, man by man, by Mr. Price and myself in the beginning of February. He spoke of it in his report as in fair working order, though rather low. On the 6th April I inspected it with my Assistant, Mr. Bradbury; of 382 persons we found 129 in really bad condition, and the remainder all showed falling off. On the 7th April, out of a gang of 59 coolies, I picked out 19 as in bad condition. But I

that "any reduction of the wage rate in this district may be attended by disaster," and recommended him to apply for Government orders before introducing the reduced wage in this taluk. On this report the Government passed the following order. (March 30th.)

"The Government note that, as respect the famine labourers, all this has occurred while the men were receiving at least 2 annas per diem. The Collector will therefore not be called upon to introduce the new subsistence wage which has been ordered for general adoption, without further inquiry and report. Mr Price will inquire whether the gangs have been short paid from fraud on the part of the maistries or others; whether they have had a difficulty in getting a sufficient allowance of food for their wages, or whether, finally, there has been any injudicious amount of task-work exacted, to account for the state of things here described."

7. 26th March.—Mr. Benson, Head Assistant Collector, reports—has "inspected all gangs on Chitwail-Hobly road." Did not see them before new rate was introduced and cannot compare their condition: many of them are in very fair condition: about 20 per cent. below par and suffering from insufficient food. Thinks the rates sufficient for women and children, but not for men, who should have half an anna more. The Collector forwarding this says (31st March) "the coolies on this road were inspected by me and I saw several who were by no means in good condition."

8. 28th March.—Mr. McCartie submits his 4th weekly report: has examined all gangs within 10 miles of Cuddapah. No perceptible change; but in each gang "4 or 5 cases will be found, generally elderly men and women, who are plainly suffering from insufficient nourishment." "The ration is insufficient for the exaction of task-work worthy the name, and there are many complaints; considerable suffering will be caused during April and the following months unless the old scale is returned to." But "the harvest has provided some members in each family with work, and many of the labourers have relations in service about the town." The Collector, Mr. Price, in sending this up remarks (30th March)—

"There can be but little doubt that the reduced scale of wages is steadily telling upon the coolies all over those parts of the district where it has been enforced."

9. 2nd April.—Mr. Benson reports—has inspected 1,500 coolies on the Cheyair, under Mr. West, Railway Engineer. The reduced scale had not been introduced nor the 3 pies gratuity given. People in fair condition; not more than 4 or 5 per cent. reduced. Many had dependants to support. Collector forwards this, 4th April, and adds—

"I have seen some 1,200 coolies on the road from Wontimittah to Tungatur. Condition pretty fair, but considerable reduction of flesh amongst women and children. I am inclined to think that the women and children have in some degree been supporting the males of their families who, in consequence of the reduction of wages, have struck. The difference between the present and former rates is, as regards women and children, so small that they come readily enough to the works."

10. 3rd April.—Dr. Townsend reported his inspection of Cuddapah coolies on the 29th and 30th March—

"Inspected some gangs of labourers employed in excavation of a tank close to the town of Cuddapah. Dr. Cornish, Sanitary Commissioner for Madras, was kind enough to accompany me. They mustered 950 in all, arranged in gangs of fifty, consisting of twenty men and thirty women and children. The number of children was small; the women greatly outnumbered the men; the people were chiefly the residents of the town and of the villages within two miles, and the Civil Surgeon, Mr. Ayaswamy, stated that a very large number of the women were the wives of sycees and other servants of Europeans. The wages given are,—men, 1 anna 5 pies; children above 7, 8½ pies; women 1 anna 2 pies; children under 7, 3 pies. Payment is made on Sundays for six days. The daily task-work nominally exacted is twenty-four cubic yards of earth-work for a gang of fifty. This task, which is very light, was commonly completed, but even if it were not, the wage above mentioned was generally given."

"In my opinion, these people were in appearance little, if at all, below the standard of health common in native populations. Some were no doubt thin and anæmic, but the proportion in this

cannot assert that this was due to the Temple ration only, nor that the members of the gang when I inspected it were the same individuals as in February. In March, April, and May, I must have inspected several thousand coolies and always with the same result. In almost all gangs about 30 per cent. were in bad condition."

Mr. Traill, Assistant Engineer, also stated—"The Temple ration was in force for a very short time in the sub-division. Mr. Gribble would not introduce it at first till he got a special order, and soon after that the order came to raise it again. Hence I did not observe the effect of the ration; moreover I had not direct charge of the works, and the men were being changed about very much. I thought it a mistake when the ration was ordered, as the people were looking low and were not getting too much wage."

Dr. Cornish, however, writing on 6th April, says Mr. West, C.E., in charge of the Cheyair embankment works, informs me that to meet the views of the district authorities and to avoid the appearance of competition in the labour market, he has reduced his rate from the ordinary 2 annas to the modified scale of Sir Richard Temple's and paid for the Sundays, and that practically his disbursements per head average same as before.

condition was not great. In many instances individuals that struck us as being more enfeebled than others were found on inquiry to have been on the works a very short time, one of them had been on a fortnight, another came on only yesterday. A very thin, weakly-looking woman had come on the works three days ago, another, a Brinjara, had been on only four days. A thin elderly man, who looked weak, was suffering from fever. One man, thin and anæmic, had been on the works from the commencement, but on either side of him there was a very stout strong man who had also been on the works for months."

"Booja road, 3 miles from Cuddapah. Inspected with Mr. MacCartie 800 people divided into gangs, each composed of 20 men, 25 women and 5 children. The women generally outnumber the men, who find other work. The people all belong to the surrounding villages. They are employed in digging and stacking gravel. The daily task assigned is 18 cubic yards for each gang, a more severe task than is imposed upon the laborers at the tank inspected yesterday. It is, however, exacted without difficulty. The rate of wages is the same as the other gangs in the district. The labourers are paid once a week on Sunday, for the six days. A considerable portion of the people in these gangs, as well as in those inspected yesterday, belong to castes who eat meat. The vudars kill and eat sheep and pigs but not bullocks. The pariahs eat carrion or the flesh of bullocks and other animals that have died. The shepherds eat the flesh of sheep and goats that die.

"The general appearance of the people composing these gangs was good. A very large number of the men and women were as stout and healthy looking as they could be in the best of times. Here and there thin persons in weakly condition were observable, but their history did not prove their condition to be attributable to want of food.

"Gang No. 1. Two thin men, but not unhealthy looking.

"No. 2. One spare weakly-looking man, states that he has been so for years.

"No. 3. Two thin feeble men, state that they have always been so. One sickly child has had fever.

"No. 4. All in good condition.

"No. 5. One feeble-looking man, states that he has always been so.

"No. 6. The same.

"Nos. 7, 8, 9. All in good condition.

"No. 10. An emaciated boy, has been on the works a fortnight and has improved since he joined.

"No. 11. A thin weakly lad, always so.

"No. 12. All in good condition.

"No. 13. A feeble man, has a large spleen; is better now than he has been for a long time; another sickly looking man has lately suffered from fever.

"Nos. 14, 15, 16. All in good condition.

"These gangs have been established from November last.

"Mr. Quinlass, the relief officer, says that when the people received the higher rate of wages, they did not spend more in food than they do now, but saved the difference. They have not deteriorated in condition since the wage has been reduced. About 15 men who had been sent to Nellore returned again to these gangs. They said the place did not agree with them; that the water was bad and gave them dysentery. The task-work at Nellore appears to be harder and the maistries more severe upon people transferred from other works.

"There were 26 applicants for work. Only one man among them, and he was a ryot who had lost all his cattle, and having no other source of maintenance, came on the works. He was a strong healthy man. The rest, all women and children, were in good condition."

11. 7th April.—Mr. Cox, Badwail Taluk, reports—Inspection shows but little change in outward appearances, but thinks "they are none the less surely suffering from the low rate of wages, especially as the hot weather is now beginning to tell on them." In one party 313 coolies in middling condition and 57 indifferent.

12. 16th April.—Mr. Benson's weekly report—Has inspected the Kodur coolies, and out of 1,764 persons selected 150, or 8.5 per cent. as emaciated. Very few children are employed; "many who could earn 9 pies are kept on the 3-pie list." Condition of coolies pretty fair, but a large number of small children very emaciated; some from fever; most from bad and insufficient food. Hopes the condition of those coolies and their children will now improve—

"1st.—Because the work is much nearer their homes.

"2nd.—Because the old and weakly are in separate gangs, and the tasks will thus be less for all.

"3rd.—Because the 3-pie bonus will be fully availed of.

"4th.—Because the more emaciated are being removed to the gratuitous relief list.

"It may be of interest to note—

"(1.) That the old men complain for the most of the insufficiency of the food.

"(2.) All natives say that children from five years upwards eat as much or more than an adult. As a corollary to this, it is observed that the children who get only 3 pies or 9 pies seem to suffer the most of any of the people. At least in their case it is most apparent to the eye.

"(3.) While some of the coolies are emaciated, others labouring beside them for months at the same work and on the same pay are actually robust: neither have any aid for their subsistence, and neither have any dependants to support; second sort of rice is the standard grain taken in fixing the rate of wages.

"At present I do not urge an increase of wage.

"The tahsildars do not notice any falling off in the condition of the coolies."

The Collector adds in forwarding this (April 20th)—

"The coolies are evidently failing in condition, and the wages are not enough. My experience in this part of the district fully bears out what is said by Mr. Benson. The infant population, i.e., sucking children, is in a very bad state. The mothers have not sufficient sustenance for them, and children of this class are dependent upon their mothers alone. I have had to send many such cases into the relief camp. If some special allowance, more than 3 pies, is not made to nursing women, the camp will be filled with them, or the greater part of the infants under eighteen months will die. I most respectfully but most earnestly and strongly, urge that this matter may have the immediate consideration of Government. I have, as will be seen from the district returns, given the experiment of the reduced scale of wages a fair trial. Although from my experience of the famine, from the time it began to be seriously felt, I have been disposed to look upon the measure in an unfavourable light, I believe that I have carried out my instructions coolly and dispassionately. I feel it my duty, however, as a public servant entrusted with heavy responsibilities, and with all deference to the opinions of those in a position higher than mine, to express the conviction that do what we can to arrest it, the consequences of continuing the present system will be of the most disastrous character, and that it will, in the long run, cost the State far more than the scale of wages provisionally in force would have done."

The Board, in submitting the above, remark as follows:—

"It appears that the child's allowance of three pies has not yet been fully granted. If this is attended to, and if Sunday payments are made generally, which the Board believe is not the case everywhere in Cuddapah, matters may improve. The 3-pie allowance should be freely granted for children at the breast as well as others. Further, it would seem better that the very weakly should be put in gratuitous relief at once instead of being kept at work, and the higher rate of wages should always be paid when increased work renders it admissible."

The order of Government on it was the following (12th May):—

"The 3-pie allowance for children under seven should be made for sucking infants as well as for those which are not in arms; the Sunday wages should in every case be given, and the higher rate of wage for higher task calculated specially with reference to the state of the soil. If these expedients for raising the rate have been already tried, the Government will be prepared to raise the rate for nursing mothers and children."

13. 24th April.—Mr. Benson has inspected all the gangs on two roads leading to Kodur, 2,153 in all, and found only 64 persons or 3 per cent. in a depressed condition from want of good and sufficient food. This he attributes to—

- (1) More general advantage being taken by parents of the 3-pie bonus to children under seven years old.
- (2) The removal of several persons in a depressed condition from the working gangs to the gratuitous relief list.
- (3) The transfer of the greater part of the gangs from the Kodur-Settigunta road to the Kodur-Chitwail, some five miles nearer their homes, an immensity of physical exertion in walking daily to and from the works being thus saved.
- (4) The segregation into a single gang of some 100 old or weakly inefficient which had been scattered among all the gangs previously. These now perform a special task of three-fourths the usual amount. The efficiency of all the other gangs being thus increased, the act was equivalent to a small decrease of task to the able-bodied; but this has been compensated for by employing a larger number of boy coolies at 9 pie who were formerly on the gratuitous 3-pie list."

He adds that there is an improvement in the condition of the 3-pie children, but there are still some wretched specimens of emaciation. The Collector forwards this with the remark that he believes the coolies are able to buy ragi and not rice, but will enquire about this.

14. On the 26th April Mr. Price reports¹ his examination of 5,599 coolies in the Budwail Taluk. He classified them with the following results; "indifferent" meaning those who were unable fully to perform the small task allotted them:—

	Men.	Women.	Children.	Total.
Condition good - -	17	10	13	13
Do. fair - -	62	69	48	63
Do. indifferent - -	18	18	31	20
Do. bad - -	2	2	6	3
Do. very bad - -	1	1	2	1
Total - -	100	100	100	100

After enquiring into the subject, he came to the conclusion that the coolies got their full wage and were not defrauded by any intermediary. The Board wrote, on the receipt of this letter, as follows:—

"3. The report deserves close attention: Mr. Price is a careful observer and competent to form an opinion, and there can be little doubt as to the accuracy of his description. The able-bodied men are

¹ Sanitary Commissioner's Report, 1877, p. 214, 6.

at present just kept going, but their condition is below par; the old men and growing children are very low, and nursing mothers are unable to nourish their infants. The numbers on gratuitous relief are increasing, and, unless some increase of wage is allowed, many on the works must succumb.

"4. There is no reason to suspect fraud upon the labourers, and their low condition cannot be accounted for in this way. Mr. Arbuthnot, in passing through the locality some months ago, found the people much reduced and distress severe, and they have not been able to regain their strength on the relief wages. The reduced wages have told more upon the people at Porumamilla than at Budwail, because, as pointed out by Mr. Price, rice is alone procurable. The fact is that the new scale has there been fairly tried; whereas in most other places where it is in force, a cheaper grain than that on the price of which the scale is fixed has been available. The Board are of opinion that some addition to the wages should be conceded to the classes who seem to suffer most at present, viz., the old persons, the growing children, and the nursing mothers."

15. 27th April.—Mr. MacCartie reports—inspected gangs on three roads, 2,060 in number. On one road, no change for the worse: weakly persons about 3 per cent. On another, coolies have improved. On the 3rd (where before they had looked wretched and their wage was calculated on prices lower than they could buy at)—

"This gave them an increase of one pie per head, or the exact amount of concession allowed in a recent Government Order. On inspecting them on the 24th instant, I found a striking improvement in their appearance, as out of 193 inspected, 15 only were in a reduced state, which gives a percentage of $7\frac{2}{3}$ per cent., and the people altogether had lost the depressed look, which struck me on my last inspection over a fortnight before; this must be ascribed to the slight increase in rate and to the fact that more advantage was taken of the provision for non-labouring children of which the people were slow to avail themselves of at first, under the impression that they would be forcibly vaccinated or transported to Nollore.

"On the whole, no harm has resulted, and I consider that the present scale may be continued as far as this taluk is concerned, for a time at least.

"Wages are calculated according to the price of rice and not ragi, which is considerably cheaper than the former."

The Collector adds:—

"Mr. MacCartie's report shows that the coolies are in good condition, but from what he says it is evident that they have, except perhaps at Yerraguntla, not been living upon one lb. of grain. From what I saw of the country on the banks of the Pennair about $4\frac{1}{2}$ miles from Yerraguntla and where the ragi crops had just been harvested, I am inclined to think that the people at Yerraguntla have been able to obtain ragi. I consider that it would be unsafe to alter the present standard."

The Board, in submitting the report, remark (9th May):—

"There seems no need to make immediate change here. The fact that ragi is obtainable, and that the wages are computed with reference to the price of rice, explains the result. The increase of one pie allowed by Mr. MacCartie at Yerraguntla could scarcely have produced so marked an effect."

16. On the 21st April Mr. Bernard wrote the following note after an interview Mr. Benson had with Sir Richard Temple¹:—

"Regarding the condition of his labourers, Mr. Benson says that the men and women on the works seem to him to be generally in good condition. But among the small children (on 3 pie per diem) he finds, especially at Kodur, a considerable number of emaciated little creatures. Many of these were found on enquiry to have come on the 3-pie allowance within the last few days only. Perhaps they will come round on the 3-pie; meanwhile those who were very reduced have been handed over to the village headmen (Reddies) to be fed at home.

"On the Choyair embankment the labourers were till recently on the 2-anna scale, but they were reduced to the $1\frac{1}{2}$ -anna rate about 20 days ago. Since the reduction took place, Mr. Benson has visited them twice, and he did not observe any sensible reduction in their condition. But then, though the wages are reduced, these labourers now get the Sunday's wage, and also get the 3-pie allowance for children, whereas previously they enjoyed neither of these advantages."

17. Mr. Price, in his evidence before the Famine Commission, made the following statement on this subject:—

"I watched carefully the working of the Temple ration in the Cuddapah district, where I was Acting Collector from the beginning of 1877 till March 1878. It was applied I believe in March, and continued until Government raised the ration in May or June. It was certainly in force for over two months. During that time I personally inspected 10,000 persons, some of the gangs two and three times; and in saying that I observed distinct deterioration, I base my statement upon particular observation of individuals whom I personally remembered. The wage was regulated by the price of rice at the head-quarter station of the taluk; and in some cases the people may not have been able to buy rice on the works at the same rate. There were, however, instances in which the price of 1 lb. of rice paid to the people on works bought more than 1 lb. of dry grain, which was the staple food of the people of the country. Where the latter was procurable, they bought it in preference to rice.

"The greatest difference that I can remember between the rates of rice at the kusha and on the works was from $\frac{1}{2}$ to $\frac{3}{4}$ of a local seer per rupee. At this time all rice used by coolies was imported grain.

¹ Blue Book III, page 394.

"On a work near Cuddapah itself which I knew well, the people deteriorated in condition. They were doing only about one-third of what the Department of Public Works set down as a full day's task. Government ordered that, if short work was turned out by the coolies, we could only fine them to the extent of the six pies, but were never to interfere with the 1 lb. part of the ration. I tried fining them, but gave it up, as I found that it produced sickness.

"There was during all this time an utter absence of vegetable food in the country; but after the eyelone of May 13th, 1877, there was plenty of green food, then came the change in ration, and between the two the coolies certainly improved."

18. In Cuddapah it seems that nearly every possible fault was committed: the three pic allowance was not given regularly, the Sunday wage was not given at all, and the wage was often calculated on prices not obtainable on the works. Mr. Price, the collector, and Mr. Cox were opposed to the lower scale from the first, but Messrs. Benson and McCartic came to, on the whole, a favourable conclusion; and Dr. Townsend's evidence as to the good condition of the labourers near Cuddapah town is decided. In fact, where a large proportion of the labourers were the wives and children of syces and people in service in the town, it is hard to believe that they can have been as reduced as Mr. Price considers they were.

III.—Nellore.

1. It appears that the reduced rate of wage was being gradually introduced into this district at the end of February, when Sir Richard Temple visited it. He thus wrote regarding the coolies:—

"Out of the large number of relief-labourers whom I inspected carefully (about 17,000 in all);¹ very few were found to be apparently in a condition to sustain themselves. The vast majority seemed to be persons of the right sort for these works; that is, persons who really needed this form of relief. Their physical condition was generally fair. But among them were found, sprinkled here and there, persons whose physical state was low and unsatisfactory. Every one of these I brought to the notice of the Collector. The total number at the time of my visit, 55,000 persons on district works and 30,000 on the East Coast Canal (of which latter most belong to the Nellore district), in all 85,000, amounts to six per cent. on the population of the district—a proportion which, though liberal and sufficient to meet the existing distress, is not excessive, considering the failure of harvests."

2. Very little seems to have been recorded by the Collector, Mr. Grose, regarding his opinions on the wage question; but the Civil Surgeon, Dr. Ross, made weekly weighments of relief-coolies on five occasions. It is not stated on what work the coolies were employed; but they were in all cases the same persons who were weighed on the first occasion on the 15th March. The following table shows the result of the weighments to be a general loss of 42 lbs.: the boys alone gained, on the whole, in weight; all other classes lost:—

		Date of weighments.	Number weighed.	Number increased.	Number decreased.	Increase or decrease of total weight.
Men	{	23rd March	22	—	—	+ 7 lbs.
		30th "	19	7	9	— 4
		7th April	8	1	5	— 19
		15th "	11	3	4	— 8
		21st "	11	4	6	— 2
Women	{	23rd March	29	—	—	— 11
		30th "	27	14	9	+ 17½
		7th April	13	6	7	— 1
		14th "	18	5	12	— 21.5
		21st "	20	9	9	— 6
Boys	{	23rd March	11	—	—	+ 2.5
		30th "	11	4	5	— 2.5
		7th April	8	6	1	+ 5.5
		14th "	7	5	—	+ 9
		20th "	6	4	2	+ 3
Girls	{	23rd March	17	—	—	+ 5
		30th "	13	2	10	— 15.5
		7th April	6	4	2	— 2
		14th "	6	1	5	— 12.5
		21st "	7	5	—	+ 13.5

In reporting the weighments of March 31st, Dr. Ross said: "It may fairly be stated from the observations made hitherto that the scale of diet calculated on is insufficient;

¹ Minute dated 6th March, para. 4.

"and yet at this time frogs, fish, and dead-cattle flesh were procurable." On 11th April he wrote:—

"The examination under report, like those which preceded it, yields no very decided result. There are so many disturbing causes, that as regards the question of the sufficiency or otherwise of the rates allowed to relief-coolies to purchase enough food to maintain life these examinations can tend to no useful purpose, unless indeed these disturbing causes be duly weighed. Most of the coolies were able during the week to obtain a considerable amount of meat, fish, &c., without cost of anything more than a little additional labour. One of the coolies confessed that he had had over six pounds of (dead) beef during the week; and as the cattle are still dying rapidly (although not so rapidly as formerly), a valuable addition to the diet of the lower castes will probably be obtainable from this source for some little time to come."

On the 18th April he remarks as follows:—

"There has been a marked falling off in all classes during the week under report, which was quite visible to the eye in most cases. The rain which fell at the end of March killed a number of the weakly and dying cattle, affording an abundant supply of food to the lower castes; while the river freshes gave a quantity of fish to the fishermen and some other castes. Thus the week previous to that under report showed results somewhat favourable as regards the condition of the relief-work coolies. But the rain which killed the weakly and dying cattle gave forage to those remaining, and the deaths among the cattle became less frequent in the week ending the 7th April. Fish, too, became less easily procurable, and the result is marked.

"The ragi crops have come in; and as the price of this grain is only one-half of that of rice, and as it contains a much larger proportion of nitrogen, the condition of the coolies who can obtain it is much better than might otherwise have been expected. Mr. Crole, the additional sub-collector, tells me that some of his relief-coolies who are now living on ragi are in splendid condition. I requested that some might be sent me for examination; and when they come, I will submit a report of the result.

"* * * * * They seem to demand more than they could obtain under the best circumstances in the best seasons, and to have perfect liberty of action also. If not satisfied in this respect, they prefer starving in their own houses to going to the relief-camps."

3. On the 17th April, the collector, Mr. Grose, reported that four of his officers noticed no change, six believed they had seen a loss of flesh. Mr. Stanley, in charge of large relief-works, state that his "workmen are in a very reduced state," but attributes this "as much to the inferiority of the rice sold there as to anything else":—

"All these gentlemen consider that the reduced scale is too low, and most of them comment on the discontent caused thus and by the enforcement of task-work; but that is not the point.

"As regards my own observations, I may state that when I came to this district, early in March, I was persuaded that the new scale of wages was dangerously low, and so gave anxious attention to the subject from the first. I still believe that the theoretical amount of grain and extras provided for by Government is insufficient to support life; but the sanitary commissioner himself states that irremediable evil will have been slowly caused before a change is perceptible to the eye; and I have seen nothing (except the opinions quoted above) to add certainty to my belief, though I have inspected many hundreds of coolies here and in Darsi and Padile, and lost no opportunity of questioning officials who have had opportunities of forming an opinion on the subject.

"The Zillah Surgeon has weighed the same coolies (selected under my orders as fair specimens) week after week, beginning on the 15th March; and I have made it a point to be present as often as possible. The coolies looked very thin and hungry at the first weighing, and they looked just as bad, but not worse, on the last occasion at which I was present, the 17th instant.

"It is not the case in this district that the relief camps are filling at the expense of the relief works. I have only discovered one recipient of gratuitous relief who had been on the works, and he was sent in by Mr. Crole, because of an affection of the eye."

The weighings were continued, and a letter from Dr. Cornish, dated 15th June (quoted in his report, page 221) shows that on the 27th May a general decrease of weight was observed except in the girls. This report is not contained in the Madras file.

4. On the 12th June, however, after the rate of wage had been raised, no improvement was evinced. Dr. Ross then wrote¹:—

"The deterioration in the condition of the coolies is most marked. It will be more so if the wretched condition in which they were when first examined is borne in mind. A glance at the tables of weights taken at different periods will show a serious falling-off in the condition of the coolies examined, many of them young, or in an age of active growth; while if their diet during the period they were under examination had been sufficient, almost all should have increased in weight."

"On this report the surgeon-general makes the following remarks:—

"The coolies employed on the relief-works are practically illustrating in their poor bodies the gradual process of dying under a starvation-diet."

5. Mr. Crole, who was sub-collector of Nellore in 1877; gave the following evidence before the Famine Commission:—

"Question 6.—The Temple ration went on in February, March, and April, and I observed it carefully. There was a road from Rapur to Atmakur, where I watched the coolies, about 1,700 or 1,800.

¹ Sanitary Commissioners Report, 1877, p. 213.

I watched them improve gradually till I drafted them off to the canal. They were in poor condition when they came on the work, and they lived away from their homes. When they became stronger and in better health, I sent them off to the canal. Dr. Ross said that they got dead cattle to eat; but I never observed this, and many were of castes which could not eat such food. I should say I weeded out at least 1,000 in this way who had improved so on the Temple ration that they were too strong for mere relief-works, and were fit for the canal and for piece-work. Some again deteriorated, but I have seen that on all scales of pay. The task imposed was a light one, supposed to be 50 per cent. of a modified hot-weather task; but they really turned out more than this. The women improved as much as the men. Payments were made daily by a superintendent on about Rs. 80. He distributed to gumasthis; they to the gang maistris; and they again, to the coolies. If the outturn was short, they were cut sometimes to a small amount, a part of the pies, never any part of the 1 lb. I was careful to see that the wage was enough to buy 1 lb. on the work, not merely at the cusba town."

6. Dr. Ross's is the most weighty evidence against the wage, since it is based on personal observation and weighing of the same individuals. But Mr. Crole's statement must also be taken as proof that in a large number of cases the wage was sufficient.

IV.—Chingleput.

1. The reduced wage came into force among the gangs employed under Major Murray, special relief officer, on the 18th February. On the 5th March he wrote in his second weekly report: "I do not as yet perceive any difference either in their condition, spirits, or in the manner or amount of their work. Of course, they grumble more or less,..... but on the whole, I think, they are doing fairly well on the present wage."

2. On the 6th and 7th March, Major Murray reported, that rice being a little cheaper in Madras, the relief wage had been lowered to 0-1-4 for men (calculated at 10 pie for 1 lb. of rice), and that in consequence all the able-bodied had deserted the works. He objected to the frequent change of wage according to variations of price as unsettling people; urged that if they did get one or two pies too much it was a good thing, and that there should be a low minimum fixed, less than which should not be given as wage; the more so as on Public Works Department works close by they could earn two annas a man. The collector, Mr. Barlow, in forwarding this (10th March) observes that "the new scale of wages is very low, too low in my opinion; but it was intended only to be just enough to keep body and soul together," and that the people would be sure to crowd into Madras, hoping to get higher wages.

3. On the 8th March, Major Murray, writing direct to Government, said:—

"Since my last report to Mr. Barlow, the deputy tahsildar in charge here has brought to my notice several cases of fainting at work. Both this officer and the hospital assistant who saw the cases attribute the fainting to no other cause but that of insufficient food."

"Since this order came into force, I have carefully watched our working people, and this morning I have gone over all (about 700) at work here; and though I cannot say I see them much poorer in looks than before, there is, I think, little doubt from all the evidence in the matter that they are insufficiently fed."

4. Next day Major Murray wrote to say, that though rice could be bought in Madras at 1 lb. for 10 pie, at or near the works it cost 12 or 13 pie, so that the workmen did not get the quantity they were intended to get for their wage of 16 pie per man, 13 pie per woman, and 8 pie per child:

"Under present circumstances, where the wage is so small and the food to be bought for it so inadequate, I am decidedly of opinion that the physical condition of the people I inspected this morning at the Poonamallee camp-works is falling off; and they complain bitterly."

The Government order on this was, that the collector was to visit the camp and see to the wage rates in force, and that Major Murray was to "forthwith introduce the payment of the value of 1 lb. of grain plus half an anna," meaning, apparently, that the wage should be so calculated as to allow the workmen to buy 1 lb. of grain at the rates current on the spot. On the 20th March, the collector reports having paid this visit on the 16th and given orders about the rates, warning the special relief-officer carefully to test the statements of coolies and grain-dealers as to the local rates of food. He adds: "I consider that the working labourers are not in good condition.....I have already reported that I consider the scale of wages to be insufficient."

5. On the 15th March, Major Murray remarked that the gift of 3 pie for infants only affected the children of low-caste people:

"The high-caste man will not bring his wife or children when unable to work, even if starving to our relief-camps. He takes home his daily wage to his village, and it is clear that, if he shares his small earning with others, his physical condition must suffer."

Mr. Barlow, in forwarding this on the 23rd March, says:—

“Nothing strikes me more than the gradually increasing appearance of distress pervading the better classes in this district.

“I do not now see what can be done beyond affording plenty of work and fair wages, and holding village officers responsible for cases of actual starvation.”

6. On the 23rd March the collector, Mr. Barlow, reports on the condition of his relief coolies for the week ending 10th March. Some of his officers see no change. Major Murray says, “I do not now think that the people are thriving on the amount of food to be bought for this wage, and I am of opinion that they are physically falling off” and three other officials say, “the coolies are beginning to look somewhat weak and emaciated.”

7. On the 24th, the collector reports for the week ending the 17th, in almost exactly the same terms. The sub-collector wanted more time to pronounce an opinion. Major Murray's verdict was again unfavourable; one temporary deputy collector said:—

“The coolies certainly did not look to me very robust and in best of health, but, as a rule, they looked tolerably healthy, although there were a few who had an emaciated and bloated appearance about them, the result of low diet.”

8. On the 7th April, the collector reported for two weeks ending the 24th and 31st March:—

“2. The special relief officer states, that he sees no change in the condition of the people under his charge since the date of his last report, and attributes this partly to people now obtaining as wage the full value of 1 lb. of rice at the retail price of the bazaars nearest the camps, plus the extra allowance for condiments, and chiefly to the fact of the wives and children of the coolies, if unable to work, being carefully fed at the camps.

“3. The deputy-collector in charge of the Saidapet taluk has noticed no changes, but the temporary deputy in charge of the Trivellore taluk says, that there has been a marked falling off in the number of coolies on nearly all the works, and that the physical condition of such as are still employed is gradually but slowly becoming impaired. He is, however, of opinion, that ‘where a man spends the whole of his earnings on himself, the rates are adequate to provide him with food sufficient for his subsistence.’ It further appears, I am glad to say, that the railway works lately begun are attracting a very large number of coolies.”

The sub-collector, Mr. McCarthy writes:—

“It appears that the most marked result of the reduction of coolies' wages has been a large falling off in their numbers. This you will observe from the numerical returns for the past week. In most places a large proportion of the coolies withdrew from the works on the introduction of the new rates, though, in some cases, they returned to work again after a few days. This was when they could not get any other employment in the neighbourhood, under the Public Works Department for instance. The Deputy Tahsildar of Utrameralur states, that he has observed some deterioration in the physical condition of the labourers, and so also apparently has the Deputy Tahsildar of Chingleput, but none of the others seem to have noticed any such result as yet. It is not an easy thing to note changes of this kind, which can only be very gradual, and I do not think the observations of officers in charge of the works are much to be depended on. One man may imagine he sees a falling off in the condition of coolies when there has been none, while another may fail to observe it when it has happened. For this reason I think it is a dangerous experiment in the hands of inexperienced persons, which can be ill repaid by the small saving of expenditure which may be effected.

“As regards works under execution by Public Works Department, the executive engineer in charge of No. 2 Range says, that the physical condition of the people employed on the Porur Tank is gradually falling off, and that ‘the others on other works are not in good condition,’ and that ‘none of them can be forced to do an average task.’ In the reports from other officers of this department it is merely stated that the physical condition of the working classes is generally good or satisfactory.”

The Board remark on this, that the reports are so conflicting that no reliance can be placed on them, and that as the Public Works Department pay by piece-work, the alleged deterioration there cannot be due to the reduced wage.

9. On the 9th April, Major Murray writes—

“I yesterday took the opportunity of Sunday being a day of rest, to inspect all the labourers at the Poonamali relief camp. This morning I have inspected those at Palaveram. The result of my inspection is, that I believe that these people are losing heart, and that during the last week they have fallen off in appearance and condition.

“I had fancied, or perhaps hoped, that during the two previous weeks, there was no change for the worse in their strength or general well-being, and my reasons for this hopefulness I gave you in my two last reports. I notice, however, now an appearance of listless weariness about them, which is distressing to see in people from whom one is bound to exact a certain amount of work before the daily pittance, which enables them to exist, can be paid. I must, therefore, again bring distinctly to notice that I believe the labourers, who are now working under my orders, are insufficiently fed.”

10. 14th April.—Collector's report for week ending 7th: The Tahsildar of Trivellore thinks the coolies are low in condition and less capable of hard work than in the previous

week, and the special relief officer states, that they have fallen off in condition and appearance, and are losing heart. Mr. Barlow himself had inspected one camp, and could see little difference in the condition of the working coolies there. The great majority of these are women and children, the bulk of the able-bodied men having gone off to the railway works.

11. *19th April*.—Collector's report for week ending 14th April, nothing fresh: "The number employed on local relief works is small, owing to the large numbers on the railway," *i.e.*, the doubling of the line from Madras to Arcunum.

12. *25th April*.—Report for week ending the 21st:—

"The special relief officer states that the labourers on works attached to the Palaveram camp 'are generally in poor condition, and are clearly suffering from insufficient food,' while those at the Poonamali camp are in somewhat better condition. The deputy collectors in charge of the Saidapet and Trivellore Taluks have observed no changes since their last report. * * * The complaints as to the inadequacy of the wage, however, continue as frequent as ever."

13. *5th May*.—Report for week ending 28th April:

"The Special Relief Officer says that 'those of the labourers who have been working on the present wage since its introduction, have decidedly fallen off in physical condition,' but the other officers have observed no change since their last reports." "I have especially inspected, since my last report, a fair number of coolies who have been on the works ever since the new wage was introduced. Their condition is not good in my opinion."

14. On the 11th May, he sent up his last report for week ending the 5th May, to the same effect:

"The Special Relief Officer says, 'the people who came under my notice as labourers in this district on the reduced scale of wage, are still falling off'; and it will be unnecessary that I should furnish any further weekly report on this subject, as I am fully convinced, and no further experience can alter this conviction, that the reduced scale of wage is insufficient to provide the labourer with the necessary food to keep up his physical condition, and at the same time do any work."

"The Deputy Collector in charge of the Saidapet Taluk has observed no changes, but the officers in charge of relief works in the Trivellore Taluk state that there has been a slight deterioration in the physical condition of the coolies, owing to the insufficiency of the scale of wages, but partly to the excessive heat of the weather."

15. The numbers employed in Chingleput on the reduced wage were too small to be of much service in this discussion. The district officers in general were satisfied with the wage, except Major Murray; and that officer changed his opinion too suddenly between the 5th and 9th of March, for his views to carry much weight.

V.—North Arcot.

1. The reduced scale of wages was introduced among the relief gangs employed near Vellore on the 3rd March. The civil surgeon of Vellore, Dr. Fox, reported on the 19th March, having repeatedly visited the 1,600 coolies at work on a tank near Vellore, that—

"in my opinion, as a body they have much deteriorated. A very considerable number are weakly and much emaciated, more especially so among the very young and the old; the men (of whom there are but few) and the young women do not show it to so great an extent; but there are very few coolies that could be classed as 'able-bodied,' and even these, who as yet are not very much emaciated, in most instances show symptoms of commencing anæmia in the pale conjunctiva and abnormally white sclerotic. Very few indeed look robust, and all form a striking contrast to the large jail population in this station."

On another work where 400 men were employed in fencing the relief camp, their condition was better and the men and young women looked better than the children and old people.

"The inferior condition of the gangs on the Suriaguntah tank, compared with those at the relief camp may, perhaps, be partly due to the nature of the work which at the tank is much harder; removing thick tenacious mud up a steep incline, and carrying it some distance; it may also be less wholesome, as the mud has rather a disagreeable smell when first disturbed; but both gangs in my opinion show insufficient feeding."

2. On the 31st March Dr. Townsend inspected the Vellore gangs and wrote as follows:—

"1,120 people divided into eight gangs of 32 (*query*—32 gangs of 35 each) in the proportion of 7 men, 16 women, and 12 children. Some of these gangs were formed on the 15th of March, others on the 21st to 23rd, and some as late as the 29th.

"These people are employed on task-work, the task being 75 per cent. of the ordinary Public Works rates, and they are paid at the following rate:—

	A.	P.
Men	1	11
Women	1	5
Children	1	0

No allowance is given to young children.

"Payment is made once a week, seven days' pay is given for six days' work. A very large proportion of the men employed were old or elderly and many of them were of spare habits, as is very commonly the case with the natives above the middle age, but they were fairly muscular and their appearance healthy. The younger men were, for the most part, robust and in good condition. The same may be said of the women. Many of the older women were thin and spare and some of them weakly-looking, but the younger women were, for the most part, plump and in good condition. The children on the whole had the appearance of being well nourished."

"Gangs of coolies, chiefly women, employed in fencing the relief camp. These gangs had been established about six weeks, and had been on the reduced rate of—

	A.	P.
For men	1	5
" women	1	0
" children	0	9

"They appeared to be in very fair condition, and there was no sickness among them."

He does not seem to have visited the coolies on the tank of whom Dr. Fox gives so bad a report, and the party he first inspected were on the higher scale of wage; the second party, however, were on the reduced wage.

3. On the 15th April, the Collector, Mr. Whiteside, reported:—

"My divisional officers are unanimous in stating that the rates of wages in force have not produced any unfavourable change in the condition of the labourers employed on relief-works. From my personal observation I entertain a similar opinion, so far as regards present effects of the existing rates of wages on the condition of the people.

"The only officer who complains of the insufficiency of wages and the consequent falling condition of the relief-gangs is Mr. Clerk, in charge of the relief-works in the Punganoor division; and he avers that there is now a very perceptible falling off in the condition of the gangs. I have authorised him to reduce the task-work in proportion to the physical capability of the working-gangs, to make alterations in them according to circumstances, to afford gratuitous relief to the aged or weak relatives of the labourers on the work who hitherto have been dependent upon them for subsistence, and the payment of three pies per diem to all children under seven years of age belonging to the relief coolies and actually present on the works, is also being made."

The Board also remark—

"The state of the case seems to be that where coolies were in good condition to begin with, the new scale of wages has been enough to maintain them in that state, but where they began work in a low state, they have not been able to regain strength on the new scale, or even to maintain their former condition. It must be remembered that the new scale has scarcely anywhere been really introduced in its entirety."

4. Again on the 26th April, the Collector wrote:—

"From the information furnished to me by the various officers in charge of relief works and from my own personal observations, I am of opinion that, during the past week, the reduced scale of wages has not injuriously affected the physical condition of the relief-labourers; on the other hand, the Assistant Collector Mr. Tremenhoe, in charge of relief-works in the Chittoor Taluk, has reported to me that he weighed some of the relief-coolies from time to time, but did not find any material deterioration in their bodily weight, and in many instances the coolies increased three and four pounds in weight during the month."

5. On the 14th May the Civil Surgeon of Chittoor reported¹:—

"On the 11th instant and 13th, I inspected about 2,000 coolies; of these, I especially examined 700 one by one. This body of 700 people comprised 350 men, 260 women and 90 children. Of the men, I consider 30 per cent. to be anæmic, of the women 24 per cent., and of the children 20 per cent. Many of those who were anæmic do not appear to have lost flesh, though their health has undoubtedly deteriorated, and daily numbers present themselves at the hospital suffering from dropsy, unable to continue longer on the works, from this cause. Many also (about 100, I am informed) have been unable during the last two weeks to complete their task-work on account of weakness, they have been fined one or two pies in consequence, which further reduced their ration. * * *

"I enclose list of weights of seven gangs of coolies. From the aggregate of these lists, it may be seen that, during the week from May 4th to May 11th, 39 coolies decreased in weight 46½ lbs., and 17 coolies increased 18 lbs., showing a decrease of 28½ lbs. in 56 coolies in a week; and that during the fortnight from April 27th to May 11th, 35 coolies decreased in weight 68½ lbs., and 13 coolies increased 19½ lbs., showing a decrease of 49 lbs. in 48 coolies in a fortnight.

"Again on the 8th June, or a fortnight after the higher scale of wages had been brought into force, Dr. Walker was not able to report any improvement."

¹ Sanitary Commissioner's Report, 1877, p. 213.

6. In his evidence before the Famine Commission, Mr. Whiteside said as follows :—

"I observed the working of the Temple ration. Mr. Tremenheere was employed under my orders weighing the coolies week by week, and I personally inspected gangs repeatedly who were working on this ration in and around Chittur. My opinion was that if the whole ration was consumed by the worker and not shared with other members of the family, it was sufficient to keep him in fair ordinary health. It was not enough to improve on, if in a low state of health. I will send Mr. Tremenheere's figures. They were reported to the Board, who pooh-poohed them, doubting if Mr. Tremenheere had weighed the same people; but he was a careful officer and was sure he had done so. I think the ration was a bare subsistence, but not enough to bring up in health those reduced, or to keep in health a man in really hard work; it is dangerously near the mark. The subsequent rate of 1 lb. *plus* 1½ annas was too liberal; people were so happy over it, they evidently did not really want it. The Bombay ration of 1 lb. *plus* 1 anna was, I think, the right thing."

7. Similarly the Collector's Sheristadar, Mr. B. Strinivasachari, stated :—

"I observed the working of the Temple ration on many works in the district. I did not observe in any case the same persons on the same works at consecutive periods of time; but I inspected the gangs on the works and was satisfied with their condition. On two or three works I did inspect the people twice and found some people fatter and some in the same condition, but no one thinner. When they did grow thinner, I should be inclined to suspect that the cause was that they share the ration with other members of their family who did not work."

8. Mr. Tremenheere's weighments have never been sent. So far as they go they would tend to weaken the conclusions drawn from Dr. Ross's weighments, were it not that Dr. Walker also weighed the coolies with such unsatisfactory results. The opinion of the district officers, except the two civil surgeons, is decidedly favourable to the reduced wage.

VI.—Coimbatore.

1. On the 2nd March the Collector, Mr. Wedderburn, reports that the reduced rates had been introduced in four taluks. In three of them the effect produced had been that a large number of coolies deserted the works; no change was observed in the condition of those who remained. In the fourth Mr. Cook, the Special Relief Officer, reported (February 24th)—

"With regard to the physique of the coolies at work since the reduction of wages, I regret to state that I observe a decided falling off. This is more marked among the men than the women. I fear that as the hot weather approaches they will find it very difficult to work in the sun, supported as they are by the miserable pittance allowed them."

In the remaining taluks the labourers worked up to 25 per cent. of a full task, and were paid at scale No. I.

2. 15th March.—Collector and Sub-Collector (Mr. McWatters) have examined nearly 10,000 coolies all on Scale I., and saw no signs of defective nutrition, though they considered it was not safe to make any further reduction.

3. 14th March.—Mr. Cook reports—

"The condition of the coolies is not as I should wish. They have certainly deteriorated owing to the small pittance we pay them, and say they are unable to do the same quantity of work they were doing before. If we want to keep up the physique of the coolies and help them to ward off cholera in these famine days, it is necessary to pay them higher wages. If Government are not willing to raise wages, lesser work should be exacted from them."

Payments are made bi-weekly, and the wages given are 1½ annas to men, 1¼ to women, and ¾ anna to children. But he has since found that his coolies are doing 75 per cent. of an ordinary task, and he intends to raise their wages to the higher scale. This alteration the Collector and the Government approved. (At this time there was a severe outbreak of cholera in the taluk).

4. 22nd March.—Mr. Wedderburn states that he had not understood before that each labourer's wage was intended for himself, and that the members of a family who were incapable of work might receive gratuitous relief. Out of 100 families taken at random aggregating 462 souls, the workers were 163, and the non-workers 299. Work is paid for weekly.

31st March.—The Collector submits reports by his Assistant, Mr. Martindale's conclusion was that the deterioration in one taluk was due to the incompetence of the tahsildar who managed the works. Mr. Cook's report is summed up by the Government as showing that while the reduced wage was in force, in February, the coolies deteriorated, but from the 1st March they were paid on the higher scale (No. I.), and since then they have improved.

6. 18th April.—The Collector argues that it is better for Government to pay the higher wage to a man who does more work and supports his non-labouring children, than to pay the lower wage to a man who does less work and who gets additional pay for his non-working children. The Board remark on this that even on the higher scale, the man should get extra pay for his non-labouring children.

7. It is clear that in this district the reduced wage was never properly tried; it was never in force in part of the district for a short time, and to the last the local officers never thoroughly grasped the idea that each labourer's wage was intended only to support himself, and not his dependents.

General.

In his evidence recorded by the Famine Commission, His Grace the Duke of Buckingham and Chandos made the following statements as the matured and deliberate expression of his opinion on the effects of the reduced wage:—

"11. As to a ration, I think I went too low in approving the Temple ration, 1 lb. + 6 pie. In May it was abandoned; possibly the raised diet was too large for the second member of a family, though not for single persons. It is true vegetable food was wanting; leaves, &c., all dried up in the beginning of the year: afterwards these revived, and may have caused an improved condition of people: during the first period, too, people eat roots, bark, fibres, which may have hurt them. The lowest safe minimum at one period might not be safe at another, and it is hard to make a comparison for that reason. I watched certain gangs for four weeks, who were on the lower ration, and saw a marked loss of condition. In Nellore some gangs kept up condition apparently on the ration, but they also ate, we ascertained, lizards and snakes, which abounded in the jungles close by, and which they spent the nights in catching."

In his report for 1877, Dr. Cornish has treated this subject at length and recapitulates at length some of the evidence which has been quoted above in this note, against the rate, but none of the evidence in favour of it. He sums up strongly against the rate of wage, but adds, that wishing to be impartial he is bound to state two other causes which conduced to lowering the vitality of the people: viz., Alterations in staple of food, i.e., the loss of the millets on which they chiefly live, and the substitution of rice; and the want of all green vegetable food at the hottest period of the year.

Again, on being asked by the Famine Commission to state on what precise examinations of the same gangs of labourers at different periods of time he based his conclusion that they were suffering from the reduced wage, he replied (March 5th, 1879):—

"4. I have delayed submission of this reply to look over in detail the diaries of Inspecting Medical officers. In several instances, weighments and measurements were taken; in others, the absence of scales and weights interfered with the experiment, and, as a rule, the people subjected to experiment could not be found when wanted for a second weighing. The evidence, therefore, except that from Nellore and Palaveram, is of no value. I must add that the movements of the Sanitary Inspectors were so constant, that they could not undertake periodical examinations of the same gangs.

"5. My general experience, founded on the examination of many thousand coolies, was that under the low scale of wages the people rapidly lost flesh. I saw, with Sir Richard Temple, on 24th of April, at Gundacul, a gang of 180 men, and these, I was assured, were the same people whom Dr. Harvey, two months before, had pronounced to be in such admirable condition that they looked as if they had never missed a meal; and yet out of this gang Sir Richard Temple himself selected 41 as unfit for any work.

"6. At Bellary and Adoni I saw gangs of labourers in April who had a fair proportion of well-nourished individuals; but three months later, in July, there was not, broadly speaking, an able-bodied labourer to be seen in the same districts. The few had either gone off elsewhere to work, or the many had undergone a gradual wasting.

"7. My experience went to show, also, that the higher rate of pay introduced after 22nd May was not immediately attended by any satisfactory improvement in the physical condition of the people. While the rate of wages was increased, food prices had gone up in a corresponding ratio; and those in whom excessive bodily wasting had occurred, failed to benefit by the considerable addition to the wages. The evidence on this point in my annual report is important.

"8. But, while my personal experience as to the exact value of the one-pound ration is wanting in detail, I would beg the Commission to understand that evidence of a similar but more exact nature, in regard to many thousands of persons constantly under observation in jails, has been before me for years, and that, on my knowledge of the effects of jail diets, I do not hesitate in repeating, in the plainest of terms, that a diet of one pound of grain in famine times, plus the extras that can be purchased for half an anna (in famine times), is utterly inadequate for the wear and tear of a human being engaged on the daily labour involved in a famine labour task.

* * * * *

"11. If the Commission desire to see this question sifted to a practical conclusion, I trust it will support my view that it should be placed in the hands of a committee of scientific experts, with full powers to institute rigid experiments on a limited number of the class of old offenders in our jails.

¹ N.B.—No weighments from Palaveram are reported.

It can never be decided by the opinion of this or that person ; and it is certainly most important that the issue raised should receive most careful examination. If Sir Richard Temple, and those who think with him, be right, it is quite clear that every jailor within the confines of India is in error, and guilty of wasteful extravagance in the feeding of convicts. In my view, jail administration, based on experience and close observation for many years, is not likely to have erred widely in regard to the quantity of food necessary for the support of a person engaged on moderate or hard labour."

SECTION II.—THE RELIEF-WAGE IN BOMBAY.

Materials for this note : (1) Mr. J. M. Campbell's *Handbook for Famine Officers* ; (2) three notes "on the general policy of the Government," &c., by General Sir M. Kennedy and Colonel Merriman ; (3) Proceedings of the Bombay Government in the Famine Department ; (4) a printed collection of papers containing reports by district officers on the civil agency rates furnished to the Famine Commission by the Bombay Government ; (5) Annual Report of the Sanitary Commissioner, Bombay, for 1877.

1. The following is a short statement of the different orders passed from time to time on this subject by the Bombay Government¹ :—

A.—For able-bodied labourers on Public Works Department works doing 75 per cent. of an ordinary task—

4th November 1876—

Men	- 2 annas.
Women	- 1½ "
Children	- 1 anna.

15th November 1876.—When grain rises to be dearer than 16 lbs. per rupee (the scale was made universal for all prices on 13th December)—

Men	- price of 1 lb. plus 1 anna.
Women	- " 1 lb. " ½ anna.
Children	- " 1 lb.

19th December.—No work to be done and no wages paid on Sundays.

26th December.—Infants under 7 years of age to get ¼ anna daily.

29th December.—Grain means the medium quality of the cheapest variety.

17th March 1877.—Fractions of a pound to be given in the labourer's favour in computing wages.

13th June.—When work is stopped by rain, labourers to get civil agency rates.

B.—For non-able-bodied labourers on civil agency works doing 50 per cent. of an ordinary task—

19th January—

Men	- price of 1 lb. plus ½ anna.
Women	- " 1 lb. " ¼ "
Children	- " ½ lb. " ¼ "

29th May 1877.—When grain is dearer than 16 lbs. per rupee, the price of ¼ lb. to be given to infants, instead of ¼ anna.

10th August 1877.—When the price of grain reaches 9 lbs. per rupee, an increase of ½ to be made to the daily wage so as to provide for Sunday, but no work to be exacted on that day.

2. On the 23rd April the Sanitary Commissioner of Bombay (Dr. Hewlett), after completing a two-months' tour of inspection in the famine districts, reported as follows :—

"The physical condition of the labourers employed on the relief-works in the Mahratta-speaking country, including Sholapur, is, on the whole, extremely satisfactory, and the sanitary arrangements for them reflect, as a rule, great credit on the officers in charge of works."

Dr. Hewlett contrasted the good condition of the labourers in these districts with the condition of those in the Kanarese-speaking districts :

The present condition of the labourers at Sholapur impressed him as to the sufficiency of the rate of wages to enable persons who had been extremely reduced to recover strength and flesh ; and if the standard he has formed, viz., the condition of the children and the adult young men and women, be (as he maintains it is) a correct one, and the only safe guide in estimating the physical condition of the people, then, even on civil agency works, the people, it is evident, have from somewhere or other procured sufficient food to prevent wasting, and to keep the children, at all events, plump and with well rounded limbs.

¹ Mr. Campbell's *Handbook for Famine Officers*, page 8.

"The people in the Kanarese districts were decidedly lower, but from the special causes fully met by the recent orders in Government Resolution No. 202 E—709, Local, dated 31st March 1877. If these orders are energetically and intelligently carried out, there is no reason why the condition of these people should not be quite on a par with that of the labourers in the Deccan districts. As far as he can see, every possible contingency is now provided for. The organization of village inspection; the immediate relief of destitute persons out of employment and unfit to work; the establishment of relief kitchens at suitable points; the issue of food to the old, the infirm, and cripples, who are too far removed from the central kitchen; the provision of employment to persons capable of work; the support of young children, with full powers to treat exceptional cases in a special manner, are measures which fully and entirely meet every possible requirement for the good of the people, and must be followed with the best results."

3. On the 27th March, the Commissioner of the Southern Division issued orders to his Collectors and their subordinates to "visit repeatedly the civil agency works and examine the gangs, to notice whether civil agency rates are sufficient, and whether the people maintain their condition," and to report their views from time to time.

Poona.

4. 29th March.—Commissioner forwards a letter from Collector of Poona (Mr. Norman) (date not given) reporting that—

"since the commencement of large public works in his district the numbers employed on works under civil agency have so much decreased, that it is difficult to say whether the rate of wages allowed on the latter class of work is sufficient or not. Observing that most of the labourers on civil agency works are so feeble and decrepit from age and other infirmities, that it is impossible to say whether their present condition is attributable to insufficiency of food or to natural infirmities; that, after inspecting nearly 20,000 labourers in company with Sir Richard Temple, the gangs which had been longest under the Public Works Department seemed to be in better condition than those which had recently joined from Civil works; and that this is notably the case on the Dhond railway, where some of the gangs, which had recently been sent from Indapur, were certainly suffering from insufficient food. Stating his opinion that a slight increase to the rates allowed on civil agency works is desirable; care of course being taken to employ none who are fit to do a fair day's work under Public Works Department."

5. 18th April.—Collector reports that his three assistants, Messrs. Keyser, Fletcher, and Ozanne, "after personal inspection of labourers on civil agency works, are not prepared to say that there is any marked deterioration apparent. The children especially appear to be in good condition."

6. 28th April.—Collector reports: "Nothing has come to my knowledge which would lead me to suppose that the present rate of wages on civil agency works is insufficient."

7. Mr. Keyser gave the following evidence before the Famine Commission:—

"I do not feel able to form an opinion about the sufficiency of the civil agency works wage. I do not think one can tell the effect of a wage: from constant inspection I can assert that it kept them in apparent good health, but I am sure it is below the ordinary food of the people of the country; and I suspect secret waste of the system may have been going on which would only appear outwardly after a long time. I had one civil agency work with 600 people, when cholera broke out and about 60 people died; and I had a suspicion that they must have succumbed the more readily through being reduced."

Ahmednagar.

8. 8th March.—Mr. Fforde, a special relief officer, writes:—

"I consider the rate of pay on works under civil agency quite sufficient."

"On their introduction I was inclined to think the lesser wages too small; but, since I have had good opportunities of observing their effect, I am compelled to say that they appear to me high enough to maintain the people in comfort, and I think the following facts will go far to support this view."

"On the Kopargaon-Newasa road there were some 600 labourers at work under civil agency; and on my informing them that I should transfer them to works under professional agency, they at once intimated that they would prefer to remain on the lesser rate of pay. * * * * On this road there was an openly-expressed dread of the larger task on the Public Works Department works, and a preference was distinctly given to the lighter task and lesser pay on those under civil agency."

"I have just sorted a body of about 500 labourers on the Chincala tank and Brahmui road works in this zilla. Out of this number, I have only discovered half a dozen who are unable-bodied, or who have no able-bodied members of their families. * * * * Many of the children had ornaments, and nearly all were chewing sugarcane, showing, I think, that there was no lack of means to live well. There was not a single complaint that the wages were insufficient, nor any demand for an increase, common enough on works where the pay is higher and the work heavier."

16th March.—Mr. Spry, 1st Assistant Collector, writes:—

"This morning I inspected a body of people numbering about 150. About two thirds of these were able-bodied, who had come on to the work since I last visited it for the purpose of drafting such persons on the railway. These I drafted off to-day. The remaining one-third were the less able-bodied whom I had left on the works previously. I do not hesitate to say, and I believe you will agree with me, that

11. 16th May.—Mr. Jacomb sends up reports by Messrs. Candy and Woodburn, which are satisfactory so far as they go, but refer to too small numbers on civil agency rates to be at all conclusive.

12. 7th July.—Mr. Candy wrote as follows:—

“When they came into force last January, I was co-operating with Mr. Spry, and made the first civil agency payment on the Nagar-Sheogaon road. The immediate result was great discontent, some violent talking, and a very general desertion of the work. There was a similar result in Rahuri taluka about the beginning of February.”

“I have since seen the working of civil agency rates on the railway and in the Shrigonda taluka. The civil agency gang on the railway, which was under me for a long time, was composed of those really unable to do hard work. They got on very fairly, and I did not observe any deterioration in their condition.

“On the Mandargaon road the coolies kept very well on civil agency rates, but they did very little work. Where the better class of people engaged in work such as cleaning-out of wells, I found civil agency rates had the effect of clearing them off very quickly.

“I am of opinion that the introduction of civil agency rates in contradistinction to Public Works rates has been most beneficial, and has saved Government a large sum of money; for civil agency rates afford only a bare subsistence, while Public Works rates allow a small margin. Hence idlers, who came on the works to make money, found their hopes frustrated by the payment of civil agency rates.”

12th July.—Mr. Hamilton reported—

“The labourers under civil agency in the talukas under my charge have continued in good health and condition on the lower rate of wages, and they appeared to get sufficient to eat.

“I think it, however, very probable that the majority of them either had some small private means or received additional help from their co-villagers. Women with small children were certainly better off than those who had none; for the additional quarter anna per head was more than sufficient for the cost of their food.”

“I think the reduction in the rate of wages was felt most by individual men and women without families, though beyond doubt large numbers of such individuals have managed to keep their health and perform a little work.”

7th July.—Mr. Woodburn had been too frequently moved to maintain a personal inspection of any one set of labourers, but says:—

“The people generally on these works have kept in fair condition, and I may safely say that those who were thin, who consisted principally of old people and young children, did not fall off in condition after coming to work, and that the thin children improved. Extra pay was given to emaciated children and others.”

7th July.—Mr. Fforde points out that the people on civil agency works lived close by, and presumably had some little means of their own to eke out their wage. He adds:—

“As regards the sufficiency of the food which could be bought with the daily ration on civil agency works to keep a labourer in health, I can only give the result of my own observations among people who were undoubtedly badly off. My experience is, that there were few, if any, who could be called unhealthy from lack of food, and there were no cases of severe distress. This was especially apparent among women who were deserted by their husbands, of whom the number has been large, and among widows. But these and the nursing mothers with their infants have been all along in excellent health. Weakness of voice, the most certain sign of starvation, has not in any case been a characteristic of these people.”

9th July.—Mr. Apaji Rao, Deputy Collector, says he has not much experience of the work; but “from what I have seen lately of the labourers employed on the works “in Nagar and Newase taluks, I always found them in good condition and “health.”

13. On the whole it seems that in Ahmednagar all the district officers, except the collector, were satisfied with the civil agency rates; but the numbers employed on civil agency work were very small.

Satara.

14. The only report from this district, printed in the collection of papers, is by Mr. Moore, the collector, dated 7th June. The relief-mamlatdars in three talukas report that the rates of wages on civil agency works are favourable; that they are ordinarily sufficient to subsist a labourer in health, and that no prejudicial effect has been noticed.

Kaladgi.

15. 1st March.—The Relief-Mamlatdar, Bijapur, reports strongly against the civil agency rates. A man requires for his support 3 lbs. of jowari flour and 3 oz. of dal,

besides salt, oil, &c. ; by the present rates he gets only $1\frac{1}{2}$ lbs. of flour and nothing else, which will only be enough to keep him alive for a month or two, no work at all being taken from him :—

“The people have now become so feeble on account of insufficient food, that I have found them on civil works, where only weak, old, and infirm persons are admitted, walking with little baskets over their heads at a very slow pace, now and then sitting down, only to be aroused by the dinning and scolding of the mustering karkuns, mukkadams, and others.”

This letter was forwarded by Mr. Silcock, Supernumerary Assistant-Collector, with the remark that he did not concur. The civil agency rate had only been in force for a fortnight, which was too short a time for a trial ; but the relief-mamlatdar himself admitted that no cases of severe distress had happened on the works. He agreed, however, that a Sunday wage ought to be given.

16. 8th March.—The deputy collector forwards reports by two other mamlatdars, who hold that the present rates are insufficient to keep the labourers in health, and are already telling on their physical condition.

17. 9th March.—Relief-mamlatdar Balaji Babaji Thakur reports against the rates. The average quantity of grain a man requires is a seer, and he needs more if he does any work in the open air. Hence the civil agency rate is insufficient, and many have left the works and got employment in the fields, where they can earn half a seer with four hours' labour. Those who remain on the works are persons whose homes are close by and who have private means. Urges that the wage should be four annas a day.

18. 13th March.—Mr. Flcet, 1st Assistant Collector, reports : “It is my opinion that the present scale of wages is insufficient, and that, to preserve strength and health among the labourers employed by us, we should allow a man $2\frac{1}{2}$ annas, a woman 2 annas, and a child $1\frac{1}{4}$ annas.” He does not speak of having inspected any works, but forwards the reports of two mamlatdars who also consider the scale insufficient, and one of whom says that the people's complaint that their strength is reduced is, in his opinion, well founded.

19. 13th March.—Mr. S. B. Pandit, Extra Deputy Collector, reports at some length against the wage, but chiefly on the theoretical ground that it cannot be sufficient. He has inspected several works day by day, and observed that the labourers eat their food in the form of gruel, not of bread, which, he thinks, is a proof that the wage is insufficient.

20. 17th March.—Mr. Hogg, collector, sends up all these reports ; says that, directly the order came out, he protested against it, and proved by figures that the rate must be insufficient. He then directed his subordinate to report on their effect, and this is the result. Except Mr. Silcock, every one condemns the reduced rate, and most officers consider that even 2 annas would not be enough.

21. On the whole, then, the Kaladgi opinion was decidedly unfavourable to the civil agency rates ; but it is clear that this opinion was mainly formed on *a priori* grounds, and that there is no evidence that after careful inspection of the same people for a sufficient period their condition was found to deteriorate. It may perhaps be added that the Bombay Government considered that Mr. Hogg was in fault for having too clearly expressed the opinion which he wished his subordinates to adopt, and that he was removed from his appointment on the ground that the experiment could not have a fair trial under him. Mr. A. Wingate, who took the principal share in the relief administration in this district at a later period, drew up the following statement for the Famine Commission :—

“I think the Bombay scales were ample. My attention was early drawn to the question of sufficiency ; and I carefully watched the people in my charge, inspecting the gangs, individual by individual, both on public and civil works, and visiting the villages, house by house. There were many gangs, families, and individuals, whom I knew very well during several months. When dealing with thousands, it is no test of a wage to find here and there somebody weak and ill. At first, I made many inquiries, and I satisfied myself there were reasons why these cases should occur ; after that, I simply set aside the exception for exceptional treatment. But to the last I could turn out the Public Works Department gangs, and feel they were as strong and cheery-looking as in a time of great trouble one would expect to find the population. Whatever a wage may be in theory, in practice I know that I can support hundreds of thousands on the value of a pound plus an anna ; that a large majority will save on that wage, and that with graduated tasks, proper hospital arrangements, and a nursery for the children of those parents who are selfish or careless, I should fear the results of no inspection. I say so after handling, questioning, and examining very anxiously large numbers, and the same people over and over again during some five or six months of the worst of the famine in the worst part of our worst

district. I go further and say what I thought during the famine, that I could turn the whole Public Works Department people over to a civil agency wage, and pick out for the Public Works Department wage the few thousands who would require it; but I would not perhaps recommend this, unless I had a very strong staff of village relief-officers."

Sholapur.

22. The only report from this district (relating to the earlier period) is one from the collector, Mr. Percival, dated 14th February, who considers that both the Public Works Department and civil agency rates should be slightly increased. He forwards a letter from Mr. Acworth, second assistant collector, who, writing on the hypothesis that Government desires to provide every labourer with two full meals of ordinary plain food per diem, shows that the civil agency rates of wage do not provide more than three-fifths of the quantity which (in his opinion) they ordinarily eat.

23. Dr. Townsend, officiating sanitary commissioner with the Government of India, deputed to ascertain whether the scale of wages was sufficient, wrote:—

"March 21st.—Rode out with Mr. Percival, the collector, to visit a gang of labourers employed under the civil authorities in excavating a tank about three miles from Sholapur. These were a much poorer lot than the gangs employed on the Moti Bagh tank. A very large portion of them were old and infirm, or in some way incapacitated for hard labour. Task-work is not exacted, and they accomplish very little in the day. The number employed here was about 300. The men receive 1½ annas, the women 1½ annas, and the children 7 to 9 pie. The bigger lads are reckoned as women. Children too young to work receive 3 pie each.

"The greater number of these people had been on the work at the above rate of wages since the middle of January. Their condition varied considerably: many were stout and in good condition; others were thin and weakly. The majority of the latter were old and infirm; but there were a few among the lads and young women who were undoubtedly suffering from the effects of insufficient nourishment. These cases, however, had come on the relief-work very feeble and emaciated, and they had improved since. The young children were in very good condition, and looked to be well cared for.

24. In evidence taken by the Famine Commission, the Rev. Harding (missionary) says: "I do not think the wages should have been so low as they were—both the civil agency and the Public Works Department rates. I formed this opinion from seeing the condition of the people after they came off the works, not while on them." And Mr. Sadasheo Pandmay Kaikar, manager of the cotton mill at Sholapur, says:—

"The wage ration of 1 lb. plus 1 anna is not sufficient. Two lbs. and one anna are sufficient. I saw the effect of the wage on roads, civil agency, near Sholapur. It made people quite weak, and they became fit for poor-houses. The 3 pies for children were not enough: they ought to get half of what an adult does. Flour or cooked food should be given instead of money wages."

25. About the time (22nd May) when the Government of Madras abandoned the reduced rate of wage on civil agency works the following classified census was taken of the labourers on the Bombay relief works:—

CLASSIFIED STATEMENT of PEOPLE, exclusive of CHILDREN under 7 years of age, upon RELIEF-Works in the AFFECTED COLLECTORATES on 19th May 1877.

Agency.	Total number of people on the work.	Number of persons belonging to the taluka in which the work is situated.	Number of persons belonging to the collectorate in which the work is situated, exclusive of those belonging to the taluka.	Number of Persons belonging to		Number of persons belonging to manufacturing classes, artisans or mechanics, or who are dwellers in towns.	Number of persons who are holders or sub-holders of land.	Number of persons belonging to the labouring classes.	Remarks.
				Other Collectorates.	Foreign States.				
P. W. Department Agency.	338,903	190,771	99,729	29,652	18,751	15,318	132,030	188,157	The difference, 4,321, is owing to the executive engineer, Kanara, and the collector of Dharwar, being unable to classify the people.
Civil Agency -	38,552	33,359	2,447	1,666	1,080	1,937	11,472	24,220	
Total -	377,455	224,130	102,176	31,318	19,831	17,255	143,502	212,377	

And the Bombay Government, writing on the 11th June, and referring to the passage in the Madras resolution of 22nd May, which said that comparatively few people received the lower rate of wage in Bombay, observed that this was true; for, though at first

nearly half the relief-labourers had been on civil works, at that time only one-tenth was so employed, it having been found practicable to organise the Public Works Department works so extensively that in the great majority of cases the higher wage was given in payment for a commensurate return of good and useful work.

25. On the 9th August, Mr. Robertson, Revenue Commissioner, reports as follows, after calling on all his Collectors for their opinion :—

“ Mr. Percival, Collector of Sholapur, has replied briefly as follows :—

‘ Before reporting, I sent the following questions to my assistants, as, although I know their opinions generally, I wish to obtain as definite answers as possible :—

- (1.) Have people who came on civil agency works improved or not?
- (2.) Have people on any civil works fallen out of condition to such an extent that they have been obliged to give up the work and come on charitable relief?
- (3.) What has been the effect of the rates on the children?

‘ The answers to these questions are—

- (1.) Doubtful, or not improved much.
- (2.) No such cases known.
- (3.) Good everywhere.

“ Mr. Percival observes that Mr. Davidson, who has watched the effect of the civil rates most carefully, sums up thus :—

‘ As a whole, I think the civil rates, modified by grants of extra allowance to nursing mothers, and with a little straining the point as to when boys and girls should be counted as men and women, and with payment as charity through the village officers to workpeople temporarily unfit for work through illness, have proved quite sufficient to keep the people alive and in health, though not to fully satisfy their appetites, or to keep their strength up to its normal point in an ordinary year.’

“ Mr. Percival adds :—

‘ Soon after I came here, I noticed that growing boys particularly complained of the low rates, and I advised the taluka officers to take a liberal view of such cases, which has been, I think, generally done in this district. It is difficult to fix the exact age at which a boy is to be considered to be an adult ; and on civil agency works this must be left to the relief-officers to decide as cases arise.

‘ With this exception, I think that the civil rates have proved sufficient for all persons on light work, and that the distinction between civil and Public Works rates should be kept up on relief-works.’

“ The collector of Satara, Mr. Moore, states that, from the opinions which his Assistants have expressed on the subject, and from his own observation, it appears to him that the civil agency rates are sufficient to maintain persons employed on light labour, such as is exacted on civil agency works, in good health and condition.

“ Mr. Jacob, collector of Ahmednagar, observes as follows :—

‘ In my previous reports on the subject of the civil agency rates I recommended a slight increase, as I considered that the rate was sufficient only for a bare maintenance ; but I am inclined to think now, from the way in which the labourers on civil agency works have kept in condition, that the addition of

Mr. Candy's No. 155, dated 7th July 1877.
Mr. Hamilton's No. 385, dated 12th July 1877.
Mr. Woodburn's, dated 7th July 1877.
Mr. Fford's No. 113, dated 7th July 1877.
Mr. Apaji Raoji's No. 594, dated 9th July 1877.

3 pies, which I once thought necessary as a margin for accidents and off-days, was not, as a rule, indispensable for the sustenance of people on work. In many cases this extra allowance was necessary, and has in reality been provided under the exceptional treatment plan ; and

I still think that though no harm has come of the reduction of wages, the cost of extras, of village inspection, of feeding weekly wanderers at the relief-houses, of allowances to children under 7 years of age, and of lower-power labour, will about counterbalance the saving that may have been effected under the change of wages.’

“ Mr. Norman, collector of Poona, observes that—

‘ it seems to be the general impression, in which he concurs, that civil agency rates have proved sufficient for the maintenance of the old and infirm, and such persons as are incapable of performing a fair day's work.

‘ On the other hand, it must be remembered that the orders of Government, under which special allowances could be granted to all persons in need of such assistance, have been freely made use of.

‘ It is also as well to note that task-work on civil agency works has never been rigidly exacted, partly for want of adequate establishment, but chiefly because the people, being in very good condition, could not be turned off, even if unable to perform the tasks allotted.’

“ It will be seen from the above that all the officers in this division, who have now had no inconsiderable practical experience, are of opinion that the civil agency rates are sufficient to maintain those receiving them in fair condition. I concur fully in this opinion. It must, however, be noticed that all lay no inconsiderable stress on the fact that much of the success attending these rates is due to the exceptional treatment which has been sanctioned by Government in certain cases. In Sholapur they have found it necessary to deal liberally when deciding whether young lads should be rated as boys or as men. The aid given to young children and nursing mothers has been also a great boon, as the civil agency rates were not calculated for these exceptional cases.”

On this letter the Government of Bombay remarked as follows :—

“The views expressed by the officers of the Southern Division in the report now submitted are confirmed by the recorded opinions of the Sanitary Commissioner to the same effect, and also by the opinions of experienced officers in the Kanarese districts, especially in Kaladgi, the worst of all the districts in the famine area ; and Government have, therefore, every reason for feeling satisfied that the wages all through the famine districts, both on civil agency and on Public Works Department rates, when paid under the adjustment of the sliding scale, and for six days only, are safe and sufficient, provided there be a proper and efficient organisation to pick up and deal with special cases of weakly persons.”

26. In paragraph 19 of his final minute, dated 24th December 1877, on the Bengal famine, his Excellency Sir Richard Temple thus sums up his matured conclusions on the subject :—

“Subsequently some controversy arose, together with some conflict of medical opinion, as to the sufficiency of these rates, especially as regards the lower scale for those employed under civil agency. The relief-officers, the sanitary officers, and all others concerned, were instructed to watch the effect on the physical condition of the labourers, attention being specially directed to the civil agency gangs. Week after week, month after month, reports came to the effect that the condition of the labourers was not deteriorating. Opinion was at first less confident in respect to the civil agency gangs, but, as experience was gained, these people also were found to continue in ordinary condition. These observations were further confirmed by the sanitary officers after inspection, as also by the Sanitary Commissioner. Later in the season, it was thought desirable to collate all the evidence, including the most recent experience on the subject. And it is now regarded in the Bombay Presidency by all concerned, as an established fact that the scale is sufficient, and ought not, in justice to the public interests, to be exceeded.”

27. And in his evidence before the Famine Committee, His Excellency delivered the following opinions :—

Answer to Q. 220.—“Speaking with the general concurrence of my advisers and coadjutors in the Bombay Presidency, I have to say that the scales of rations which prevailed in this Presidency have been found sufficient, not more than sufficient indeed, but still sufficient, and no more. In connection with this point, the strictness of supervision must be taken into account. If Government can rely on the relief people obtaining all that they are entitled to, then these rations are sufficient ; but Government cannot be confident of this, unless ample supervision is ensured. If, from any circumstances, the affair of relief passes out of control, if the numbers of people on relief multiply faster than the supervision, then we may be quite sure that these people will not get all that they require, and under such circumstances there is great danger of a ration which is barely sufficient being stinted by various sorts of speculations and thus becoming insufficient. In a ration restricted to bare sufficiency, no margin exists for speculation and the ration becomes condemned because it never was fully doled out. Unless therefore Government is quite sure of keeping relief thoroughly under control, unless abuses can be rendered next to impossible, it may be prudent for a time to allow a somewhat larger ration than would otherwise be allowed, upon the plain ground that if perchance poor people do not get all they are entitled to, still they will receive enough to sustain relief. If under any circumstances I were to find that relief people were crowding upon me beyond my power of immediate management, I would allow for a time something over the ration allowed in Bombay, simply as a margin for safety ; but, as soon as the affair was brought under control, I would gradually introduce the Bombay ration. If, on the other hand, the affair was thoroughly under my control from the beginning, I would advocate the Bombay ration. This, however, is a matter upon which I am unwilling to dogmatise. If there be any reasonable doubt, I would give it in favour of the people, and would rather incur the additional cost of the enhanced ration than run any risk of endangering life. In the Madras Presidency, the controversy which arose was recorded at the time. I have only now to say that when serious doubts were raised by the local sanitary authorities, I obtained from the Government of India the services of the then highest sanitary officer in India, and, after he had carefully conducted extensive examinations of the relief labourers, his written opinion was received in detail, and my recommendations were guided thereby. Subsequently the opinions of this high medical authority were endorsed by the sanitary officers in the Bombay Presidency. So far, then, as medical authority went, it was amply in support of the recommendations which I made.

Mr. Caird : Q. 221.—Did the high authority confirm the Bombay ration?

Answer.—Yes, he did. But always, both in the Madras Presidency and in the Bombay Presidency, we provided that there should be extra allowance made for those who required special treatment. This provision was carefully carried out in the Bombay Presidency. How far it may have been carried out in the Madras Presidency I can hardly say.

Mr. Sullivan : Q. 222.—Did you not modify your original recommendation in Madras and allow something extra for young children attending along with their parents in relief?

Answer.—My original recommendation was open to some misapprehension on this head, which misapprehension I rectified by a supplementary recommendation. At one time the Sanitary Commissioner of Madras appeared to consider that my ultimate recommendation, on the ration generally, very nearly went as far as his own. But be that as it may, shortly after I left that Presidency the Madras Government, according to their own judgment, early in May I think, adopted some slightly increased ration.

General Strachey : Q. 225.—On the whole, did the Bombay ration succeed in the Madras Presidency, or fail, so far as you know?

Answer.—I cannot say whether it succeeded or failed, for it was tried only for a short period of about 2½ months, and that not universally. In the month of May 1877, the Madras Government

reverted to the more liberal ration, which ration was, as I believe, in full operation throughout the brunt of the famine in that Presidency. Whether the lesser ration would have proved sufficient or not, had it been persevered in, is a question which cannot now be answered. It never was brought to the test of proper experience."

28. In his Sanitary Report for 1877, Dr. Hewlett wrote the following remarks as conveying his final impressions and experience¹ :—

"The general run of people on the Public Works rates were healthy labourers mostly in the prime of life with their families: but on Civil Agency works, the old and infirm, and less physically capable, were employed, but with them there were always many young adult men and women, and children, who would not forsake their aged relative.

"In judging of the sufficiency of the rates, I always took the condition of the young adult men and women, and the children, as my standard. In India the labouring classes show symptoms of age, comparatively speaking, very early in life, and the normal condition of old men and old women in this country is to be lank, thin, and withered; but their condition would have been no true guide in estimating the general physical condition of the labourers. If I saw that the young men and young women, and children, were well nourished and without any symptoms of wasting, I felt convinced that they obtained sufficient food somewhere or other to maintain health.

"The question which has so often been discussed as to whether a pound of grain for six days in the week is sufficient for a subsistence allowance for a native of India, never really arose, because each man received half an anna besides the value of allowance of grain, with which he could purchase dhall, and a little curry-stuff, vegetables, and salt.

"When first established, I had very grave doubts as to the sufficiency of the Civil Agency rates, and shortly after they came into force I travelled through the Dharwar and Kaladgi Districts, and as before stated, from what I saw in the latter, where, however, I subsequently learnt that the instructions of Government regarding expenditure in charitable relief, and for the relief of young children, had not been carried out as strictly as they should have been, I reported most strongly against the continuance of the rates and urged that, at all events, a seventh day wage should be given; but on visiting Civil Agency works in other collectorates, where the orders of Government had been fully carried out, I was constrained to report that the people on Civil Agency rates obtained sufficient food to prevent wasting. Subsequent and anxious enquiries into the matter confirmed me in the conviction of the sufficiency of the Civil Agency rates for the class of the people who came on to these works and for the amount of labour demanded from them. It became clear that the majority of the people seeking aid on these relief-works had private stores of their own with which they supplemented the rates, whilst those who had absolutely no money and were weakly and emaciated received special treatment and were not put to work until recovered.

"The universal testimony of the district officers went to prove that strong people remained strong, and weakly and attenuated people recovered strength and flesh; and there can be no doubt that these rates, in dealing with large bodies of this class of labourers at all events in the first year of famine, are sufficient, provided that care is taken to supplement the rates by the treatment of special cases and by careful attention to seeing that the allowance for young children is drawn and distributed. Regular daily payments are also an important and necessary measure."

Summing-up.

1. The evidence as to the practical working of the lower scale of wage has run to such length that it is advisable to recapitulate briefly the more important heads before proceeding further.

2. The cases in which, after a trial lasting over a considerable time, judgment was pronounced against the reduced wage in Madras, are the following:—

(1.)—At Gundakal,² on the 24th April, a gang was found in what Sir Richard Temple considered to be "a fair condition," but Dr. Cornish held that it had deteriorated greatly since it was first inspected in February.

(2.) The Deputy Collector of Bellary,³ 18th April, found that the females and young children in particular were suffering. But the Native Deputy Collectors of this district seem all to have been led away by a theory as to the quantity of food required for consumption; one committing himself to the extravagant statement that an ordinary coolie requires 4 lbs. of dry grain a day, another holding that women eat more than men.

(3.) On the 21st April,⁴ Mr. Oldham found it necessary to raise the wages of his labourers, except in one case, to the higher scale, because the men were falling off, though the women looked sleek and fat. Here no wage was given for Sundays to the ordinary gangs, and up to the 20th March, if not later, the infants' ration had not been fully given: apparently the wages had been calculated on prices at which the labourers could not purchase on the spot, and were not given on rainy days.

¹ Bombay Sanitary Administration Report for 1877, pages 251 and 252.

² p. 8, para. 6.

³ p. 9, para. 7.

⁴ p. 9, para. 8.

- (4.) On the 28th April,¹ Mr. Glenny raised the wages by 3 pie all round ; but this was in lieu of Sunday wage which had not previously been given.
 - (5.) On the 26th March,² Mr. Benson thought the male labourers in want, and Mr. Price saw several who were not in good condition.
 - (6.) On the 16th April,³ Mr. Benson inspected a large gang at Kodur and found 8·5 per cent. emaciated, especially small children, but many children able to work were not allowed to do so and received only the infants' ration ; many infants did not receive it at all, and many persons were on the works who ought to have been receiving gratuitous or special relief. Sunday payments also were not, apparently, made. The result of the introduction of these reforms (that is, of the complete carrying out of the Government order which had hitherto been disobeyed) was that on the 24th April Mr. Benson found only 3 per cent. of the labourers in a depressed condition and a general improvement had taken place.
 - (7.) In Nellore,⁴ the weighments made by Dr. Ross tell of deterioration in the labourers, who seem to have been a peculiarly depressed and emaciated lot from the first ; nothing is reported as to the work they did and whether they got Sunday wages or not.
 - (8.) On 17th April,⁵ Mr. Stanley reported that the labourers on his relief-works were falling off, because of the badness of the rice sold to them.
 - (9.) In Chingleput,⁶ Major Murray reported strongly against the wage. At first it was calculated on prices prevailing at a distance, and at which they could not purchase their food ; but when that error was corrected they did not, in his opinion, improve.
 - (10.) At Vellore,⁷ the Civil Surgeon found the coolies in a gang, which he had repeatedly visited, falling off in condition ; in another gang they kept in good case. Apparently the task in the first case was too heavy, and it seems probable from what Dr. Townsend wrote shortly afterwards they received no Sunday wage.
 - (11.) The Civil Surgeon at Chittur,⁸ reported (14th May) very unfavourably ; the coolies were dropping off the works into the hospital, and many were unable to fulfil their task : his weighment shewed decrease in weight. Here it appears probable that the rules as to special treatment were not properly carried out, for the feeble ought to have been put into special gangs and not to have remained in ordinary gangs in the works till they were fit for hospital.
 - (12.) In Coimbatore,⁹ in one taluk, the coolies were found to deteriorate so early as the 24th February ; but on the 14th March, finding they were doing a full task according to Scale I., the relief officer raised them to the pay of that scale. If this statement is correct, the severer task on reduced wage accounts for the previous deterioration. Moreover in the reports from this district it is clear that village relief was not actively carried out, but that the labourers supported feeble relations out of their wages.
3. On the other hand, the following are the cases in which the opinion of responsible officers was delivered in favour of the reduced wage :—
- (1.) On the 20th March,¹⁰ Dr. Townsend found a party of 7,500 near Bellary who were getting less than the reduced wage, and yet had improved on the works.
 - (2.) At the same time¹¹ that Mr. Glenny was raising the wages to make up the Sunday wage, he reported that the condition of one-fourth of the workers at Tadpatri was "exuberantly good."
 - (3.) On the 3rd April,¹² Dr. Townsend inspected two sets of labourers' gangs near Chihilapali, and although the Sunday wage was not being given he reported favourably on their condition.
 - (4.) On the 27th April,¹³ Mr. McCartie reported favourably of his inspection of over 2,000 coolies : in one case they had received wages calculated on prices at which food was not obtainable on the spot and had fallen off, but they improved again when this error was corrected. This is, however, explained by the fact that wages were calculated on the price of rice, and that ragi had just been harvested and was to be bought cheaper.

¹ p. 10, para. 11.² p. 19, para. 2.⁷ p. 25, para. 1.¹⁰ p. 7, para. 3.² p. 13, para. 7.⁵ p. 20, para. 3.⁸ p. 26, para. 5.¹¹ p. 10, para. 11.³ p. 15, para. 12 ; p. 16, para. 13.⁶ p. 22, para. 4 ; p. 23, paras. 9-14.⁹ p. 27, para. 1 ; p. 28.¹² p. 14, para. 10.¹³ p. 17, para. 15.

- (5.)—Mr. Crole¹ deposes distinctly to the improvement he witnessed among coolies on the reduced wage at Nellore.
- (6.)—Dr. Townsend,² on the 31st March, inspected the Vellore gangs, and while one party receiving the higher scale of pay were in rather poor case, another party on the lower scale were in very fair condition.
- (7.)—Mr. Whiteside³ reports strongly in favour of the working of the reduced wage, and quotes the weighments made by Mr. Tremenheere in support of his conclusions.

1. In the Bombay Presidency, with the exception of the objections of all the Kaladgi officers but two, and of the opinions expressed by some officers in the early stages of the experiment, which opinions they afterwards saw reason to change, the conclusion of all the responsible officers (except Mr. Keyser, who expresses himself doubtfully) is unanimous in favour of the sufficiency of the Civil Agency wage, which, it will be remembered, was lower than the reduced Madras wage in respect of not admitting a Sunday wage, unless food was dearer than 9 lbs. per rupee.

5. The conclusions to which a consideration of this evidence leads the Commission are as follows:—

6. In Bombay the weight of opinion is given with almost complete unanimity in favour of the ration. The following reasons seem chiefly to have conduced to its success:—

- (a.) The clearness and precision with which the order was given, and the absence of subsequent modifications, fixed it in the minds of the officers and made it easy to carry out.
- (b.) The smallness of the numbers to which it was applied admitted of personal inspection of the labourers and supervision of the working of the rule.
- (c.) The officers who administered it were for the most part thoroughly efficient, and carried out the entire system with discrimination, working this rule in connection with those for the special treatment of the feeble and for village relief.
- (d.) The labourers in some cases had resources of their own; in some districts prices were much cheaper than in the Madras famine tract, and in none (except Kaladgi and Sholapur) was the pressure of famine so severe.

7. In Madras the evidence is more conflicting, and the information is so incomplete that it is impossible to deduce from it any definite conclusion as to the sufficiency or insufficiency of the wage. The reduced rate was nominally in force on one class of works from the beginning of February till the 22nd May; but the Commission have not had the means of learning whether the deterioration was more observable on these works than on those where higher rates prevailed; or in fact, whether deterioration was observable in any case in which the orders of Government were properly carried out. In several cases where the people in receipt of the wage suffered, the cause is shown to have lain in disobedience of the orders of Government and in neglect of the supplementary measures designed to accompany the wage for actual workers; in some cases, where the people are said to have prospered, the cause is alleged to have lain in the fact that they were able to procure more food than the relief wage alone could have obtained. On the whole, however, looking to the manner in which the system was carried out and the results which the reduced wage produced on the people who received it, the weight of opinion is against it. The chief causes of its failure appear to have been these:—

- (a.) The scale of wage was not laid down with clearness and precision; provision for infants was omitted, and a supplementary rule had to be issued almost directly regarding them; another supplementary rule was added afterwards regarding the Sunday wage; these additions and alterations confused the minds of the officers employed, and the result was that in hardly any place were the orders carried out in their entirety.
- (b.) The numbers concerned were extremely large, so that it was impossible for the relief-officers to supervise them constantly, to ensure that the wage was paid duly and paid in full, and the task suitable to their strength, to watch closely the condition of individuals in receipt of the reduced wage or to secure for them special treatment and exceptional allowances the moment they began to deteriorate and before they became emaciated and fit only for hospitals.
- (c.) The orders as to special treatment and extra allowances being given to emaciated persons were imperfectly carried out, and in no district was the system of village-

¹ p. 21, para. 2.

² p. 25, para. 2.

³ p. 26, paras. 3, 4, 6.

relief in complete and efficient working at the time the reduced rate of wage was in force.

- (d.) The labourers, probably from the conjoint effect of both physical and moral causes, were in a low condition of body, and failed to improve even under the increased rate of wage given in June.
- (e.) In most cases the only food obtainable in the markets was rice, to which the labourers were unaccustomed and which may have injured their health.

NOTE ON THE RESULTS OF THE ENQUIRIES MADE INTO THE MORTALITY IN THE NORTH-WESTERN PROVINCES AND OUDH.

Govt., N.W.P. and Oudh, No. 596, dated 17th March 1879.

1. *Extent and general results of the enquiry.*—Mr. Bennett inspected 50 villages in about a month's time in the districts of Lucknow, Barabanki, and Rai Bareilly. He did not test the census taken in 1869, but was satisfied that the population had considerably increased since then (paragraph 5). In these 50 villages he found that 3,380 deaths had actually occurred in a population of 50,705 against a registered mortality of 3,062, being an excess of about 10 per cent. The rate of mortality was 66·6 per mille for 14 months, or 57·1 per mille per annum.

2. Mr. Roberts in a little over a month inspected 62 villages in the districts of Agra, Etah, and Mainpuri. He took a census in all these villages, and found a population of 35,674 as against 36,588 in 1872 (paragraph 13). The registered mortality in these villages had been 1,382, and the actual number ascertained to have died was 2,298, or an excess of 22 per cent. The rate of mortality was therefore 64·3 per mille for 14 months, or 55·1 per mille per annum.

3. Captain Pitcher began his enquiries in November, and in the course of 2½ months inspected 196 villages in Shahjahanpur, Bareilly, Budaun, Moradabad, and Bijnor. In most of these he took a fresh census, but not in all: and in some villages he was unable to ascertain the registered mortality. Putting these cases aside, in 112 villages he found a population of 26,097 as against a census population of 27,640; and the number of ascertained and verified deaths were 2,052 as against a registered mortality of 2,620, the registration being thus 23 per cent. in excess of the reality. The death-rate, on Captain Pitcher's figures, was 73·6 per mille for 15 months, or 62·9 per mille per annum.

4. *Accuracy of the registration.*—On this subject there is a considerable difference between the opinions formed by the investigating officers.

5. Mr. Bennett finds that, on the whole, the mortuary returns were very fairly accurate, and that where errors occurred they arose from very natural causes.¹ People who died away from their villages were sometimes recorded twice over, in their own villages and in the place where they died. On the other hand, the reporting officials themselves were liable to death and disease from starvation; and irregularities and omissions occurred from divided responsibility and from incompetence. But, on the whole, he considers that "an immense improvement has lately taken place in the registration, and that in a large number of villages it is very nearly perfect."

6. Mr. Roberts' view is not very different. He finds the registration to be considerably below the truth, but is satisfied² that in the course of his enquiries he did not discover the whole of the mortality. He especially refers³ to the difficulty of ascertaining the number of deaths in the case of strangers who die along the road, and of families of which no member remains. He finds that it is impossible to expect the survivors to remember every death that occurred. He believes that, though his verified number exceeds the registered number of deaths by 22 per cent., the real excess was not less than 25 per cent.⁴ But, in spite of this, he holds that⁵ "defective as the registration was, it was greatly more looked after than in any previous year." He entertains no doubt that "a smaller proportion of deaths has been unreported this year than was ever the case before." As to the census of 1872, he throws no doubt on its accuracy at the time it was taken, but shows that since then the population⁶ has shifted somewhat from the dry and barren to the canal-irrigated tracts, and that this disturbs the percentages which may be drawn out for any particular locality.

¹ Paragraph 6.

⁴ Paragraph 21.

² Paragraph 8.

³ Paragraph 39.

³ Paragraph 6.

⁶ Paragraphs 13—15.

7. Captain Pitcher alone makes an uncompromising attack on the figures both of the original census and of the mortuary registration. As to the former point, he took a fresh census in most of his villages, and found inexplicable discrepancies between it and the figures of 1872. In one village he counted¹ 593 people instead of 186; in another² 807 instead of 450; and several other such cases are mentioned in his report, so that he sums up his conclusion³ thus: "The fact seems certain that the population of the district up to October 1877 was far in excess of that on which the average for mortality statistics are calculated." It is of course possible that such gross errors as these may have occurred; though those who were concerned in taking the census of 1872, or those who may read in Mr. Plowden's report the description of the elaborate and careful measures taken for securing accuracy and for testing results, will be rather slow to believe it. But it is also possible that an explanation may be found for the discrepancies which Captain Pitcher was unable to discover. The commonest cause of such apparent discrepancies is the inclusion of a hamlet in, or its exclusion from, the figures of a parent village. The mauza of the Revenue Department, which is the unit of a census, is an arbitrary tract. It may contain several hamlets or none at all; and it would have been impossible for Captain Pitcher to tell whether a given collection of houses a little way off was a separate village or a hamlet attached to the village he was counting without a reference to the revenue records. That this is the real explanation of these discrepancies seems probable from the fact that the total population as counted by Captain Pitcher agrees so closely with that of the census; and he is evidently in error in the assertion quoted above from his 15th paragraph, seeing that his enumeration (26,097) is not in excess of that of 1872 (27,640), but slightly below it.

7. Next, as to the mortuary registration, Captain Pitcher is positive that he verified all the deaths that actually occurred, and that the excess reported is mainly due to the stimulus imposed on the chaukidars, which led them to exaggerate the facts. He holds that "every death in a moderately sized village is, as a rule, well known to, and well remembered by, the rest of the villagers." In this view he is opposed to the experience of Mr. Roberts, who has shown that, as a fact, such deaths are not always remembered, even where memory was easy⁴; and he makes no allusion to the two cases of special difficulty which Mr. Roberts specifies—the deaths of strangers, and the deaths in families which have altogether disappeared. There seems, therefore, to be a strong *prima facie* probability that Captain Pitcher is mistaken in thinking that his verified record contains all the deaths that actually occurred; and a reference to his detailed village notes proves that it does not contain them. In many of these notes he enters a remark as to the number of members of the family who had fled the villages; and in several cases he mentions that so many left and have died on the relief-works or in distant parts. Thus in villages Nos. 16 and 17, 89 have left, a large number of whom are supposed to be dead; in village No. 75, out of 23 emigrants 7 are known to have died; in No. 76, out of 124 several; in No. 77, out of 28, 16 have died. If, as Mr. Benett points out, these are entered both in their own villages and in the place where they died, they will be recorded twice over; but, on the other hand, if they are not entered in their own villages, there is great probability that, wandering through the country, and dying in groves or outhouses, they will not be recorded at all.⁵ If, then, Captain Pitcher refused to enter in the village records the names of any who died out of the village, he should necessarily have been very careful to enter any strangers who had died within the village; and when a large portion of the population was in such a state of flux as those figures indicate, it would appear probable that there would be very few villages within whose precincts during these fifteen months no stranger's death should have been recorded.

8. The reverse, however, is the fact. There are very few villages against which the death of any stranger is recorded, and, what is more extraordinary, even when they are recorded, these deaths have generally not been counted in. In the case of villages Nos. 28 and 29, 4 strangers died in each, and their deaths have been added to the total; but in No. 33, 2 are noted as having died within the village, and yet are not included in Captain Pitcher's total of deaths. In No. 49, 4 such deaths occurred, but are not included; in No. 54, 3; in No. 64, 2. In Nos. 90, 92, 93, 110, the same omission occurs. And in the great majority of villages no allusion is made to the subject. Now, it is admitted by all observers,—and Captain Pitcher confirms⁶ the fact,—that "there

¹ Paragraph 16.

² Paragraph 36.

³ Paragraph 15.

⁴ Paragraph 8.

⁵ Comp. paragraph 7; the case where the deaths of Ahir infants, though recorded in the infanticide registers, were not entered in the death returns, nor remembered by the people. Mr. Benett, however (paragraph 3), found that in the case of relatives the memory of the survivors was good.

⁶ Comp. Mr. Roberts' paragraph 55 as to the omission to report deaths of wanderers.

⁷ Paragraph 84.

" was far greater mortality in proportion among those who left their homes, whether for " poor-houses, for relief-works, or to wander in search of friends or work," than among those who stayed at home. If, then, Captain Pitcher's figures show almost exclusively the mortality among those who remained at home, it follows that they cannot be accepted as a complete record of the entire mortality. And the probable conclusion is, that the reported deaths, as they fell short of the true numbers in the other two tracts inspected, so in Rohilkhand also they erred by default and not by excess.

9. The general conclusion on this head appears, then, to be, that the mortuary registration was below the truth. But all three officers are agreed that the work of registration was much more carefully performed than usual. On the other hand, they have not perhaps made sufficient allowance for the fact that the difficulties in the way of accuracy were so much greater than usual. A chaukidar may be expected to report the deaths of people whom he knows; but when a large mass of population is in movement, and people are dying along every road and in out-of-the-way places, it is almost impossible that all such deaths should be recorded. In other provinces it has been held that the registration was worse in famine than in ordinary times. Dr. Cornish writes:¹ " Death registration in ordinary seasons fails to take note of more than two-thirds of the " actual mortality. In famine seasons, with the disorganisation of village life and communal " administration, it is probable that not one-half of the actual deaths, especially in the early " months, were ever recorded." It has been shown that considerable improvement in the system of reporting was effected; but it required considerable improvement in order that the Province should not fall back and the registration become worse under the increased difficulties. It is possible to contend that the same ratio existed in 1878 as in other years between the registered and actual mortality—hardly that a closer relation existed. Where one officer finds that 10 per cent. of the *known* deaths and another that 22 per cent. were not recorded, it is not unreasonable to suppose that the *unknown* deaths of wanderers must have raised the actuals to at least 30 per cent. above the recorded numbers.

10. Several improvements in the system of registration (such as the preservation of the record, and the entry of the name of the deceased, without which verification is hardly possible) have been suggested in these reports; and it has been shown that great errors exist in the supposed population of certain registration circles—errors due apparently either to original mistakes of addition, or to subsequent transfers of villages from one jurisdiction to another without a corresponding alteration of the totals. These points will no doubt be attended to by the Local Government, and need not be further referred to here.

11. *Causes of death.*—Mr. Benett finds² that the 3,380 deaths registered by him can be assigned to the following causes :

	Deaths.	Per Cent.
Hunger - - - - -	1,723	51
Small-pox - - - - -	686	20
Fever - - - - -	443	13
Other causes - - - - -	528	16

12. Mr. Roberts classifies as follows,³ separating the mortality into two periods :

	November.—June.		July.—December.	
	Deaths.	Ratio.	Deaths.	Ratio.
Hunger - - - - -	221	18·4	57	5·4
Bowel-complaints - - -	110	9·3	175	15·8
Small-pox - - - - -	276	23	34	3
Fever - - - - -	476	39·1	708	64·4
Other causes - - - - -	112	9·5	128	11·4

¹ " Influence of Famine on Growth of Population," page 17.

³ Statement 3.

² p. 19, Abstract of Form I.

13. Captain Pitcher gives¹ the following figures for 27 villages of Shahjahanpur and for the rest of the districts inspected by him, with a population of 37,176 :

	Deaths.	Ratio.
Want - - - - -	1,549	56·5
Small-pox - - - - -	339	12·4
Other causes - - - - -	856	31·1
Total deaths - - - - -	2,744	100

the general death-rate on the population being 76·5 per mille.

14. *Small-pox*.—All officers agree in stating that they find no connection between the prevalence of small-pox and the acuteness of famine. Mr. Benett shows² that it was severest when famine mortality was lightest, and vice versa: “So invariably is it the case that in places which have been decimated by famine there is hardly a trace of small-pox, and vice versa, that a hasty reasoner might be inclined to regard famine as a prophylactic against the disease.”³ But he holds it possible that the same disorganisation of the seasons which produced the famine may have rendered the human body unusually susceptible to epidemics. Mr. Roberts says⁴: “I am not disposed to think that the mortality due to small-pox was in any appreciable degree influenced by privation due to scarcity.” And he goes on to mention a village where twice as many Brahmins died as Chamars; the former being free from any distress, and the latter suffering severely from privation. “Many villages escaped the small-pox altogether, and when it entered a village, it spread among the well-to-do quite as much as among the poor.” Captain Pitcher, too, speaks⁵ of small-pox as occurring in the houses of those well to do, rather than those who might be supposed to be in straitened circumstances.

15. *Starvation*.—Mr. Benett reckons⁶ that in the tract inspected by him, out of a population of 45,000 souls, 1,521 died from famine, or at the rate of 33·8, and that these deaths occurred at the following periods: from November to February, 20; from March to June, 6·5; from July to December, 7·5 per mille. Applying this ratio to the population (partly modified by local circumstances) of the whole of the famine tract, he finds⁷ that, out of a population of 715,000, the deaths from starvation amounted to 18,850. He believes that the mortality began in November and December, and was most acute from the middle of January (after the fall of rain, which destroyed field labour at the wells) till the middle of February (when the fields began to yield some sustenance), being at the rate of 15 per mille for that period. After the harvest-time there was no more famine; but distress began to reappear in May, and continued till the rains were well established.

16. Mr. Roberts believes⁸ that the number of deaths from starvation was considerably underrated, both from failure to record such deaths at all in the case of wanderers and from unwillingness to attribute this as the cause, especially in the case of the higher castes, among whom there was a feeling of shame in acknowledging such deaths. He divides his record into two periods—from November to June, and from July to December. And with reference to the number of deaths recorded in the second period (57), he observes⁹ that they were due, not to want of food, but to breakdown of the constitution owing to privations endured during the scarcity; many of the deaths occurring among returned emigrants. The returns of the Agra Poor-house are quoted to show that, while there were 1,481 deaths in the first period, there were 1,232 in the second; many of the latter however being due to the fever epidemic which raged in Agra in the autumn of 1878.

17. Captain Pitcher considers¹⁰ that no starvation deaths occurred after the cutting of the rabi; but he speaks of many deaths from eating new grain, which probably is only an indirect form of death by starvation. His village notes show that he believed many

¹ Statements 3 and 4.

² Paragraph 44.

³ This is probably true in a sense which Mr. Benett did not intend. Those who have died of famine cannot die again of small-pox.

⁴ Paragraph 47.

⁵ Paragraphs 51, 57.

⁶ Paragraph 42.

⁷ Paragraph 46.

⁸ Paragraph 53.

⁹ Paragraphs 57 and 58.

¹⁰ Paragraph 26.

of the deaths to be wrongly attributed to starvation, and to be really due to small-pox: The grounds for this presumption are not stated.

18. *The classes that suffered.* (1) *Sexes.*—On this subject much useful information has been collected. First, as to sexes. Mr. Benett's returns show the deaths of 583 adult men against only 263 adult women, or 19·20 and 8·5 respectively of the numbers he recorded. Mr. Roberts, out of 126 classified cases, finds deaths of 42 adult males and only 8 adult females.

Captain Pitcher records 570 adult males and 213 adult females as dead, or 2·67 adult males to every adult female.

19. The explanations given are—

- (1) that the woman keeps the household stores and helps herself;
- (2) that she has ornaments, which she sells on her own behalf;
- (3) that women's work, like sweeping the houses of the rich and grinding, continued when field labour was stopped;
- (4) that a husband will rather starve himself than see his wife starve;
- (5) that the brunt of the struggle falls on the men wandering in search of employment, watching crops at night in the extreme cold, &c., from which the women are free;
- (6) that women are less ashamed to beg and importune for help than men;
- (7) that there are more men than women in the general population.

20. Mr. Roberts (paragraph 59) thinks there was some disinclination on the part of the men to ascribe their women's deaths to starvation; but Mr. Benett strongly rejects this (paragraph 28). It will be remembered that the same phenomenon of an excess of male over female deaths is seen in the returns of the two Southern Presidencies and Mysore.

21. (2) *Castes.*—Mr. Benett took great pains to classify the deaths specially recorded

as famine deaths according to castes, and to work out their ratio to the total population involved. Mr. Roberts did not compile any such statistics, thinking that caste is not a complete indication of a man's position in life. Captain Pitcher records with great fulness the statistics of all his "verified" famine deaths by castes. The results are shown on the margin. It is admitted by every one that the weavers suffered very severely. In Bareilly both the cotton crops were lost, so that they were deprived of their supply, and also the market for their cloths, if they wove any, was dead. In Rai Bareli, however, the Koris, though weavers by caste, are mainly employed in ordinary years on field labour. As to the Kahars, Captain Pitcher (paragraph 34) makes some interesting remarks showing how they have suffered from

CASTE.	Ratio of Famine Deaths per Mille of Population.	
	Mr. Benett.	Captain Pitcher (Shahjahanpur omitted).
Koris	50·6	28·1
Jalahas	—	30·4
Chum	61·0	63·2
Pasis	37·72	39·2
Lodhs	30·41	—
Ahirs	25·0	16·0
Kurmis	17·63	—
Brahmins	5·72	7·3
Thakurs	3·61	6·8
Banjars	—	23·0
Barinis	—	30·4
Kahars	—	23·8

the progress of civilisation as well as from the hardness of the times.

22. (3) *Occupations.*—A more important classification is that by occupation. Mr. Benett shows that¹ in his tract the mortality was almost entirely among the labourers. He divides the population thus—

	Per-centage of population.	Per-centage of total number of deaths.
Cultivators of more than 5 bighas	25	10
" less "	30	22
Labourers	20	68
Non-agriculturists	25	—

Here the 68 per cent. of deaths attributed to labourers includes a few, but not many, rural artisans, such as washermen, potters, tailors, &c. It was these rural labourers who suffered far more severely than any class; and as most of the cultivators holding less than 5 bighas (or 3 acres) live more by field-labour than by the profits of cultivation, Mr. Benett attributes about 80 per cent. of the deaths to the labouring classes. Of the cultivators proper, he says² that they suffered severely, especially from the loss of cattle,

¹ Mr. Benett's paragraph 28.
² Paragraph 26.

³ Captain Pitcher's paragraph 29.
⁴ Paragraph 37.

but that few died of starvation. The landowners¹ were never near the point of famine. Mr. Roberts observes² that "it was the poor who starved, mostly field-labourers. " Cultivators and zemindars did not, as a rule, want for food, as they had resources in " the sale of their property and in borrowing." Captain Pitcher finds³ that "the " mortality affected chiefly the very old and the very young among the labouring " classes, both in the villages and towns." " The sufferers were chiefly aged people and " young children among tenants with small holdings, agricultural labourers, and village " artizans. Beggars in the villages do not appear to have suffered heavily." In his classified list of castes (Statement 4) he distinguishes in 15 cases those who are cultivators from those who are labourers, with the following results :—

	Total population.	Total deaths from all causes.	Ratio per mille.
Cultivators - - -	17,546	329	19
Labourers - - -	3,722	290	78

All of these are apparently field-labourers, as the list includes no such castes as weavers, potters, &c., who are often both artizans and agriculturists, and the mortality among them is nearly four times as great as among the cultivating classes proper. It is to be regretted that neither Mr. Roberts nor Captain Pitcher have given any information bearing on the question whether tenants with occupancy rights were found at all better able to resist the effects of the drought than tenants-at-will.

23. *Special local causes of excessive mortality.*—Mr. Benett shows⁴ that in the districts which he visited the tract where famine was acute was a low rice-producing tract, in which the failure of the crop was complete. On each side of it, as the ground rises and other kharif crops are grown which did not suffer so much, the death-rate becomes less. Mr. Roberts dwells on the influence of the severe epidemics of small-pox and fever on the death-rate. Putting them aside, and looking at starvation-deaths, which he distributes thus⁵—

Agra - - -	6.1 per mille.
Etah - - -	7.8 "
Mainpuri - - -	3.4 "

he offers the following explanations. The constitution of the resident population has to be considered. Taking four registration circles in Agra, he finds that two of them, Hatkant and Bah, are inhabited by poor and low-caste people; two, Batesar and Kachaura, by well-to-do Brahmins. And the figures are—⁶

Hatkant - - -	35 per cent. of the mortality due to famine.
Bah - - -	21 "
Batesar - - -	12 "
Kachaura - - -	9 "

Also the emigration from the dry tracts and to the irrigated tracts disturbed the population and lowered the recorded mortality of the dry tracts unduly.

24. Captain Pitcher found⁷ that the mortality was greatest in the valleys of the Ramganga and other rivers and in tracts where rice is chiefly grown; and this he attributes to the insanitary condition of these villages, though it seems possible that Mr. Benett's explanation may be the true one here also, viz., that rice was the crop that failed most signally. He also reports that the mortality depended a good deal on the character of the village population and their mutual relations. The mortality was lowest where the people were homogeneous⁸ and mostly of one caste and ready to help each other; where the relations of zemindar and tenant were not strained, but friendly⁹; where rents were paid in kind, not in cash;¹⁰ where rents were not rigorously exacted.¹¹ These conclusions would be of higher importance if Captain Pitcher had possessed any previous acquaintance with the locality, or had been able to devote a longer time to the inquiry so as to ensure a thorough acquaintance with the local peculiarities of these villages. He does indeed state (paragraph 91) that "it can be shown that the difference " in adjoining circles and adjoining villages is due to the assistance given by zemindars " and head cultivators to their dependents;" but he has omitted to show it. Neither his report nor his village notes contain the data on which these generalisations are built up.

¹ Paragraph 38.

³ Paragraph 23.

⁶ Paragraph 66.

⁹ Paragraph 32 (a).

⁴ Paragraph 96.

⁷ Paragraph 78.

¹⁰ Paragraph 42.

² Paragraph 81.

⁵ Paragraph 47.

⁸ Paragraph 24; paragraph 32 (b) and (c).

¹¹ Paragraph 75.

¹² Paragraph 77.

25. *Effect of relief measures on the mortality.*—We come next to a very important branch of the enquiry,—what influence on the mortality was produced by the remedial measures adopted by the Government? In the parts inspected by Mr. Benett there seem to have been only three poor-houses, relieving on an average less than 500 people between them, while private relief-houses supported about 1,000. It was impossible, therefore, that much benefit could be traced to these operations. Besides which, his evidence as to the popular aversion from this mode of relief is extremely strong, and contrasts singularly with the experience of 1861 and 1869, when no such violent dislike was recorded; but, as Colonel Baird Smith states, every Native Relief Committee unanimously agreed that the system of giving cooked food ought to be rigidly adhered to. The relief-works were on a more extended scale, and Mr. Benett believes¹ that they had a most unmistakable effect in keeping down mortality. His figures may be tabulated as follows:

—	Number of distressed Population.	Average Number relieved in February 1878.	Relief per cent. of Population.	Rate of Famine Mortality per mille.
Drighijaiganj - -	250,000	13,500	5.4	18.87
Haidargarh - -	50,000	1,280	2.56	47
Mohaulganj - -	140,000	720	.71	66

The severity of famine was nearly equal all over this tract,² though perhaps most severe³ in Mohaulganj; and the difference in the death-rate is attributable, in Mr. Benett's opinion, to the extent to which employment was given on relief-works.

26. Mr. Roberts considers⁴ that the relief-works must have been very efficacious in preventing starvation; but the labourers not being local, but brought often from a distance, the effect cannot be traced in the death-rates of particular localities. He observes, however, that in Etah the expenditure relatively to population was twice as great as in Agra, and thinks this may account for the lower famine mortality in Etah. But this argument is partly vitiated by the fact that there were no special relief-works at all in Etah. Mr. Roberts probably alludes to ordinary works carried on in the district, which no doubt gave assistance to many impoverished labourers, though not specially organised for relief purposes. As to poor-houses,⁵ he only remarks on their unpopularity, and the fact that they were mostly tenanted by wanderers in the last stage of exhaustion brought in by the police. They can hardly have acted, therefore, as measures of local relief.

27. Captain Pitcher found that little or no good was done by relief-works. They were mostly roads, the work on which moved on rapidly; and villagers would go to them as long as the work was going on near their homes,⁶ but left when it passed on to a distance. Poor-houses, he thinks,⁷ were too much hated and dreaded to do much good. To be useful at all, there should be completely separate enclosures for the lowest castes; but he deprecates any reliance on them for the purposes of famine relief.

28. *Suspension of revenue; advances to landlords; and assistance given by landlords to tenants.*—Mr. Benett admits⁸ that suspension of revenue cannot reach the labourers, who are the real sufferers, but he yet thinks it a more important measure even than relief-works, since it is more important to keep cultivators from debt and ruin than labourers from death by starvation; and it may enable a small proprietor to employ hired labour. Many landowners in Drighijaiganj tahsil opened relief-works, and some, but not all, took advances from Government for this purpose. Some gave loans to their tenants,⁹ and more stood security for them with the money-lenders. From quarter to half the rent remained in arrears, it being impossible¹⁰ by the exercise of any severity to collect it.

29. Mr. Roberts states¹¹ that, though the revenue was suspended in the autumn, it was collected afterwards in full out of a poor rabi; but he finds that the exaction of the

¹ Paragraph 56.

² Paragraphs 91 to 93.

³ Paragraphs 72, 84.

⁴ Paragraph 38.

⁵ Paragraph 47.

⁶ Paragraph 94.

⁷ Paragraph 52.

⁸ Paragraph 95.

⁹ Paragraph 49.

¹⁰ Paragraph 73.

¹¹ Paragraph 50.

themselves if a Brahman has come into contact with it. Most of these difficulties might be overcome in the case of a relief kitchen kept open by a wealthy Hindu. The character, at least, of the cook can be depended upon, and that the food has been prepared with a proper regard to the ordinances of religion. This can never be the case with a Government kitchen; in addition to the ever-wakeful apprehension of attempts on their caste, the Hindus feel that they have no security that any low scoundrel may not have been selected to cook, or even that he is a Brahman at all. When the Bachrawan relief-work poor-house was removed to Dirgbiaganj, where cooked rations were distributed, all the poor of the smallest pretence to respectability declined to follow it, though they had been drawing three pice per diem with the greatest thankfulness. The tehsildar of Dirgbiaganj sent out a chaprasi to bring in a colony of 14 Ahirs and Lodhs whom he knew to be starving at a village a few miles off. They said they would rather die than lose their caste, and a week later two miserable old Ahirs crawled in saying that all the rest had died, and that being left alone they had no longer the spirit to resist the food that was so near them."

Para. 55. Use of distribution of cooked rations.—"The objections to the distribution of cooked rations are, then, that it does no appreciable good, and that, while it saves an infinitesimally small portion of the dregs of society, it leaves good men to die."

Mr. Roberts says—

Para. 91. Poor-houses.—"There was the greatest objection among all classes of the people to avail themselves of this form of relief. In no villages that I visited did any of the higher castes, however poor, admit that they entered one; even among the lowest classes, loss of caste seems to have been occasionally the result of it. The poor-houses were largely recruited by starving wanderers whom the police compelled to come in; as a great number of these were in the last stage of starvation, the mortality in the poor-houses was excessive. In Agra poor-house and hospital, the deaths from the opening of the poor-houses to their closure in October 1878 were 2,674: all these may be put down to starvation. In view of the reluctance of the people to enter them, it may be fairly alleged that nearly all the recipients of poor-house relief, who did not die there or then, or shortly after leaving, but for the poor-house would have perished. I have not been able to ascertain to my satisfaction all the grounds of this reluctance, but there may be added to the sentiment which makes the work-house detestable to the poor in England a special prejudice arising from caste. A person who leaves his village and seeks alms may be supposed not to be particular as to the caste of the giver of food to him, and he is judged, therefore, to have become impure in his caste. In the poor-house his food may have been distributed by a Brahman, but he begged: did he receive food from Brahmans only?"

Captain Pitcher reports that—

Para. 72. "Everywhere I found in the villages the practice of excommunication from caste resorted to by all castes, except sweepers and 'Chammar Chamars,' against those people who went to the poor-houses. Instances may be seen in my diary of families found by me as living out of caste among the following:—Ahirs, Kurmis, Jolahas, Koris, Kahars, and even 'Jatya' Chammars; while, for the most part, the people who had returned had done nothing but beg ever since, and a very large proportion had died since their return. I found many instances of people who had gone to the poor-house, and after staying there some time returning of their own election to die at home. I am sure that inspection of the returns, whenaired out, will convince any one that the poor-houses had very little effect in mitigating the mortality of the rural classes."

Para. 81. "Poor-houses will never be more popular than they are now until Chamars and Bhangis are relegated to separated enclosures. In the villages the Chamars have a perfectly separate quarter, and the sweeper a perfectly separate house, for the Chamar holds himself superior to the sweeper. No one who has not been on foot through many villages can appreciate the utter loathing and dislike entertained by the rest of the village towards the Chamars. I found Mussulmans sharing this feeling as well as Hindus, and I often found all the people who could do so sink off when I came to enumerate the Chamar families. At the same time, having seen the demoralization of those who have been to poor-houses, I am convinced that to render the poor-houses more popular is simply to increase pauperism, and that all measures should be tried which would keep people at their homes. There was far greater mortality in proportion amongst those who left their homes, whether for poor-houses, for relief-works, or to wander in search of friends or work. More than once people remarked—"Those who died of hunger were those who left their villages, while those who remained quietly at home survived."

As the Honourable Syed Ahmed Khan was the officer who (under Sir J. Strachey, then Magistrate and Collector at Moradabad) established and managed the famine poor-house at Moradabad in 1861, which has ever since been held to be the model for such institutions, and as neither in the history of the famine of 1861, nor in that of 1868, is there any record of such hostility being felt towards poor-house relief as is now reported, I drew his attention to the above quoted passages, and asked if he could suggest any explanation of this change in the popular feeling. In reply, he has favoured me with the following valuable memorandum.

10-6-79.

C. A. E.

1. I have perused the reports made by Messrs. Benett and Roberts; and Captain Pitcher, on the last famine. There cannot be given any decided opinion in regard to the unpopularity of those poor-houses in which cooked food is distributed, until it is known how they were managed. But these reports do not describe the character of the management.

2. The management of poor-houses is of course a difficult task, and their popularity or unpopularity depends, I think, to a great extent, on the character of such management.

At the time when Sir John Strachey was the Magistrate and Collector of Moradabad, the management of the poor-house at that station, which contained a large number of persons of every caste and sect, devolved on me. I am now going to enumerate the principles on which that institution was established. A comparison of those principles with the above-named reports, which dwell on the unpopularity of the poor-houses, will throw some light on the discovery of the real causes of that unpopularity.

3. The poor-house at Moradabad was established on the following principles :—

- (1.) A committee was formed which consisted of respectable Hindu and Muhammadan members who used to select every morning and afternoon persons fit to be admitted into the poor-house, as well as those to be sent to the relief-works,¹ out of the lot that assembled every day. Persons selected for the poor-house were each given a ticket marked with a number, and ordered to sit in a separate quarter. Those appointed for the relief-works were given similar tickets and sent to work. Persons employed in the relief-works also received cooked food. As no arrangement could conveniently be made with regard to caste system at such relief-works, therefore those persons only who did not mind caste restrictions, and who were somewhat strong and healthy, were ordered to such works.
- (2.) Persons selected for admission into the poor-house had to present themselves immediately before the said Committee to undergo a sub-division with regard to the variety of castes. (I.) The *Bhangis* (sweepers), for instance, who are hated and disliked by persons of all other castes, were enrolled in a separate register; (II.) the *Chamars* and their cognate class, the *Chamar Kolis*, were entered in another; while (III.) the *Musalman*s, and those of the *Hindus* who declared that they had sought alms and received food from every person without regard to caste, and that they no longer observed the caste system, were put in a third register, though these latter would have no objection at all had they been placed into the company of the *Chamars* even. (IV.) Those *Hindus* who were particular about caste were enrolled in a fourth register.
- (3.) The poor-house which was established in a spacious garden was divided into two separate enclosures. The larger of these enclosures was assigned to the first three classes named above, and the smaller one to the fourth and last class.
- (4.) The former of these enclosures contained a number of smaller areas enclosed by bamboos, spacious enough to receive 1,000 persons (or 500, the exact number I do not remember) sitting in four rows, one on each side, to take their food.
- (5.) Separate areas were assigned to different classes and castes; as for instance, the area assigned to the *Bhangis* contained none but the *Bhangis*, that assigned to the *Chamars* contained none but the *Chamars* or *Chamar Kolis*, and that assigned to the *Muhammadans* contained none but the *Muhammadans* or those of the *Hindus* who had already renounced their caste. A separate register was kept for each area, and a clerk stood at the door, at the time when food was to be distributed, to let in those persons only whose names were enrolled in the register. These persons had become so accustomed as to seat themselves in their proper places with regard to numbers. There was only one kitchen for all these castes, and the bread, which was of a definite weight, was baked in ovens by Muhammadan cooks, and the number of breads allotted to each individual was marked in the register kept by the clerk. Proper arrangements were also made to have the bread and *dal* (or any other thing to eat with bread) distributed to persons in each area.
- (6.) The second enclosure, which was assigned to the *Hindus* who observed the distinctions of caste, had a long barrack or kitchen built into it. The management of this kitchen and the distribution of food belonged to those members of the committee who were respectable *Hindus*. Some of these members were Government servants, such as *Munsiffs* and *Sadar Amins*, and others were some of the respectable *Hindu* residents of the city. These members used to enquire about the caste of the persons taken into the enclosure, and could do this very easily. Arrangements made within this enclosure are as follows :—
- (a.) This enclosure contained a well, and proper arrangements were made for those *Hindus* who used to bathe before taking their food, according to their religious custom.

- (b.) Separate *Chaukas* (dining grounds) were provided for each class of those people who had no objection against taking their food in the same *Chauka* with other members of that class or caste. This *Chauka* was so made as to be contiguous to the place where their food was cooked, and was very easily prepared, simply by sprinkling water over the ground, and then drawing four lines, one on each side.
- (c.) These Hindus almost wholly consisted of persons who had no objection as to taking food cooked by the Brahmans who were appointed by the Hindu members. They received their food cooked by these Brahmans within the precincts of their *Chaukas*, which were wide enough not to render the food impure on the score of its happening to come out of the *Chauka*, conformably to their religious ordinances.
- (d.) There were some persons, though very few indeed, who objected to take food cooked by any other person but one of their own caste. Such persons were separated from the rest, and permitted to prepare their food themselves jointly in a separate *Chauka* within the same enclosure. Their shares of flour, dal, and fuel were of course given to them.
- (e.) There were, moreover, persons (though rare) who were so prejudiced and superstitious as not to touch food cooked by any other person but by their own hands. Such persons were each allotted a separate quarter for making their *Chaukas* within the same enclosure.

4. These were the only arrangements connected with their food. There does not seem any necessity for mentioning those relating to their living and their employment in the poor-house, their medical treatment, their bathing, and the change of their clothes. Such a management can never be expected to give birth to complaints mentioned in the above-named reports.

5. There is no doubt that the class of persons who have already been ex-communicated before they set their foot into the poor-house will never regain their caste after leaving the poor-house. When I was sent to take charge of the poor-houses at Gorakhpore and Bisti, I found that almost all the Hindus then attending the poor-houses had been previously excommunicated, and that they did not mind the restrictions of caste, and had no objection against food, by whomsoever it might have been prepared, although the food they received in the poor-houses was cooked by Brahmans. The reports do not make any mention as to the fact whether the persons said to have lost their caste had been excommunicated previous to their entering the poor-house or not.

6. I am now going to take a glance at the reports. The difficulties arising from the caste distinctions of which Mr. Bennett speaks in paragraph 51 of his report might well be removed by a management similar to that at Moradabad, described above.

7. The statement made by Captain Pitcher in paragraph 72 of his report, regarding the excommunication of persons admitted into the poor-houses, does not show whether their caste had remained unsullied at the moment they had entered the poor-houses, and whether the poor-houses were managed according to the caste system adopted at Moradabad. From paragraph 84 of the same report it appears that this was not the case, as he states there that "poor-houses will never be more popular than they are now" until Chamars and Bhangis are relegated to separate enclosures," which shows undoubtedly that they were not made to sit separately.

8. I cannot understand that "to render the poor-houses more popular is to increase pauperism," nor do I see any other way of helping people which may prevent pauperism. The suggestion that persons should not be drawn out from their homes, and that succour be given to them at their homes, is pleasing to the ears, but I do not think it possible to bring it practically into effect, nor can relief-works be opened everywhere near the homes of the villagers.

9. With reference to paragraph 94 of Mr. Roberts' report, about the reluctance on the part of the people to avail themselves of the poor-houses for fear of the loss of caste, I would make the same remark as I have done in the case of Captain Pitcher, with the addition that the statement made by Mr. Roberts that "the poor-houses were largely recruited by starving wanderers whom the police compelled to come in," gives much reason to believe that the inmates of the poor-houses were for the most part those persons who had already lost their caste by begging in from door to door.

10. No measure whatever that may be adopted for giving relief to people in a famine is free from its attendant defects, notwithstanding its manifold benefits, and a manager is necessarily inclined to weigh those defects and benefits, and adopt the one in which the latter prevail. On this principle I must own that the establishment of the poor-houses is not faultless just as any other measure is not so.

11. The evil which results from the distribution of money or of raw materials of food to the paupers is, that they often choose to lay it by and live on a very bad and unwholesome sort of food, which increases disease and mortality. I have myself occasionally found out persons in a poor-house who had got piec, cowries, flour, and corn with them. They might have collected these things by begging, but they would not spend them, and chose to live on very revolting things which they picked up from the earth rather than part with their stores. The food which they received in the poor-house was good, and it could not produce such bad effects. Another difficulty in distributing money (supposing that they will spend it in feeding themselves) is that they will not sufficiently be able to make arrangements for their food separately, as separate arrangements require greater expense. There are, moreover, many persons who are in some way or other incapable of making arrangements for their food themselves, and the supply of cooked food to them is considered to be the greatest boon.

12. Arrangements were also made at Moradabad for washing the persons of the paupers and for changing their corrupt and noisome clothes, which was indeed considered as a precaution against the spread of disease.

13. Poor-houses do certainly check or rather put a stop to that practice of embezzlement and fraud which attends the distribution of cash money, even when given to labourers on the relief-works. While at Goruckpore, I came to the knowledge of everything connected with the relief-works where thousands of paupers were employed on a road near a celebrated bridge and on a tank. After trying every means I could not see how to put a stop to such malpractices. I once happened to meet a man who was distributing wages to his party, and asked him how he knew that all these persons belonged to his party, and that he distributed the money justly, and gave every one the exact amount due to him. He replied that I could not understand such things until I performed the work myself. Giving the lowest value to my estimate, I can, with confidence, say that one-fourth of the amount is embezzled in the distribution of cash money, whether in relief-works or anywhere else.

14. There were, however, various kinds of work performed at the poor-house at Moradabad, such as the spinning of cotton, the weaving of cloth, *durries*, and blankets, and the twisting of ropes, &c. These articles, when prepared, were sold to defray a portion of the expenditure incurred in supporting the paupers. A third part probably (I do not recollect the exact amount) of the whole expenditure was thus repaid, and was, from time to time, added to the relief fund, so that we were thus able to support four thousand persons (for instance) by a fund which was originally capable of supporting three thousand persons. Quite contrary was the case of cash distribution by which we should have hardly been able to support three thousand persons by a fund which would have well sufficed for the support of four thousand persons.

15. There is no doubt that the poor-houses are liable to some defects, such as—

- (1.) Defects in management. As I have often heard of mismanagement in most of the poor-houses that were opened during the last famine, I am inclined to conclude that a poor-house and mismanagement are closely connected with one another.
- (2.) It is undoubtedly a fact that the higher classes of people, whether Hindu or Muhammadan, and particularly the women who have the slightest claim to respectability, consider it a great disgrace to go to a poor-house, and it is not strange that some might have preferred starvation to that disgrace. If I am not mistaken, the same feelings may have been entertained in Europe with regard to the poor-houses. But this does not incline us to regard the poor-houses as defective, but to make some other arrangement for this sort of people.

At Moradabad two plans were adopted to meet this difficulty. In the first place, a certain quantity of cotton was every week sent to the women at their houses with an amount of money sufficient to maintain them during that week. They had to spin the cotton and then send it back to the managers of the poor-houses. Although the persons charged with the distribution of these things were selected

from among trustworthy persons, yet I doubt not that some irregularities occurred in the matter. In the second place, men who felt a shame in entering the poor-house like other paupers were nominally taken into employ on small salaries in the poor-house or relief-works, though there was in reality no need of their services. This measure did not, however, prove thoroughly effective. The abundance of the servants had of course the effect of ensuring a satisfactory management of the poor-house and the relief-works.

- (3.) The people certainly do not like to leave their homes for poor-houses as long as they can support themselves in some way or other. It was, in my opinion, one of the foremost principles we had in view in the management of the poor-houses (whether I was right or wrong I do not know) that those persons should only be admitted into a poor-house who could not support themselves in any other way. Hence the failure of those persons to join the poor-house, who could in any way support themselves at their homes, was considered by us as the attainment of one of the best principles.

16. In conclusion, I beg to state that I never heard that persons of the fourth class above mentioned, who had got a separate enclosure for taking their food in the poor-house at Moradabad, were ever excommunicated. The state of management of a poor-house is soon rumoured abroad, and the effect which the good or bad state of its management has had on the continuance of a person in, or his exclusion from, his caste may thus have been known to the people.

SYED AHMED.

9th June 1879.

MYSORE.

This sketch is compiled (by Mr. C. Campbell of the India Office) from Mr. C. A. Elliott's Report on the Mysore Famine.

Causes of Famine.—In 1875 the rainfall was extremely scanty. The early rains were light, and the autumn rains entirely failed, the result being a very short crop of the autumn dry grains, and an entire failure of the winter rice. The country, however, was in so prosperous a condition at the time that, though much anxiety was felt and preparations for relief were made, no real distress ensued. The rainfall of 1876, however, was even more deficient than that of 1875. The S.W. Monsoon was very light, whilst the N.E. monsoon failed entirely. The dry crops came to nothing, and the tanks and wells being exhausted through the drought, the late rice crop also was a total failure.

The effect on prices of these bad seasons was that ragi, the staple food grain of the province, had risen by November 1875 to 22½ seers per rupee, or more than double the usual price, to 18 in August 1876, and to 6½ in December.

History of the Famine.—As soon as it was clear that the failure of the rain had been general and must produce a wide-spread loss of food, preparations were made to open relief-works, and at the close of October¹ the Chief Commissioner laid down the system on which he proposed to administer relief measures. This system embraced the digging of wells and the encouragement of irrigation by lowering the rates of assessment, strengthening the police and the district establishments by closing the civil courts and utilising their staff; but he demurred to the proposal to supply famine labour on the railway to Mysore, or on any large works, as well as to any scheme for buying grain or interfering with trade. The Government of India approved these instructions and accorded their emphatic approval² to the system of carrying on minor works at numerous places, instead of concentrating large bodies of labourers on works at a distance from their homes. However, with regard to gratuitous relief, the old principle was adhered to, that it was mainly the duty of the community to assist those who were unable to work, and on the 2nd November³ the Chief Commissioner called a public meeting at Bangalore, at which subscriptions were invited, an equal sum being promised by Government, and a Central Committee for administering this relief was appointed.

¹ R., p. 24-5.

² R., p. 26.

³ R., p. 26.

This Committee continued its functions in the town of Bangalore till the end of September 1877. Similar measures were adopted in other large towns, and where private charity failed Government stepped in. Early in February¹ Sir R. Temple, the famine delegate from the Government of India, visited Mysore. His report on the general condition of the people at the time was not unfavourable. He did not observe many cases of emaciation or any of starvation; it was known that there was some increase in the death rate, but the increase was attributed to cholera. He approved of the system under which "good useful work on irrigation tanks is being done at piece-work rates," and thought it unnecessary to begin any large work till the numbers of applicants increased. He considered that the economy with which relief operations were conducted in Mysore contrasted very favourably with Madras. The reform he chiefly urged was the introduction of a system of village inspection and house to house visitation, and a strengthening of the existing staff where necessary; and some subordinate officers were detailed to this work, but it was neither efficiently carried out by them, nor effectively supervised by the superior staff.² Towards the end of February cholera in a severe form broke out and continued to rage with great violence till June. The mortality was very great in the relief kitchens, where the sick and infirm had no chance of escape; when it broke out in the works it had the effect of dispersing the gangs.

In the beginning of April³ Sir R. Temple revisited Mysore. He still continued to take an optimist view of the situation, and considered that the results of the relief administration still compared favourably with the neighbouring districts of Madras, even after all the economy and reduction which had been introduced into those districts, and that the labourers on relief-works were in fair condition. At the end of March through want of proper arrangement and system the numbers on civil relief-works fell from 55,687 in the last week of March⁴ to 32,000 in the first week of April, and never recovered; the numbers in receipt of gratuitous relief simultaneously rising gradually from a monthly average of 43,600 in March to a maximum of 227,067 in August.

This period was one of extreme depression and of gloomy forebodings that the monsoon would fail again. After a cyclonic fall of rain in May the rainfall was extremely light through June, July, and August, and it was during these months that the distress and mortality reached their climax. The loss of cattle, too, owing to the want of pasture, was very great. On the 1st September agriculture was at a standstill and all field labour was stopped; the starving people, finding that the relief-work did not provide them a sufficient or a certain subsistence, crowded into the large towns, and especially to Bangalore, in such numbers as to swamp the machinery for distributing gratuitous relief, and died in large numbers in holes and corners of the town. Rain began to fall and continued throughout the month. On the 6th the Viceroy arrived at Bangalore, and on the 8th he addressed a letter to the Chief Commissioner in which a scheme for reorganising the whole system of famine management was delineated, a chief feature of which was the appointment of a Famine Department presided over by Mr. C. A. Elliott as Famine Commissioner, with Mr. Wingate as Famine Secretary. As it was further considered necessary to make a radical change in the system of relief-works, Col. Sankey was relieved of his post as Chief Engineer, and Major Moncrieff appointed in his place. Under the new central authority a Famine Code was drawn up and uniformity introduced into the relief arrangements; gratuitous food was confined to those who were altogether unable to labour, and was given for the most part subject to the condition of residence in a poor-house; while everyone who was able to do any work, however little, was employed on relief-works. These were almost without exception large works of permanent utility, and were placed under officers of the Public Works Department. The establishment employed in administering famine relief was largely increased, and an active system of house to house inspection of the villages was set on foot, with a view to relieving at home those who were infirm and feeble, and to stimulating all others if in distress to seek employment by work. The numbers on relief-works at once rose, the monthly average in November being 75,850. The intensity of the distress was now however past, for the rain gave fresh life to agricultural occupations, and the spontaneous produce of grasses and weeds was collected with avidity by those who could not get work. The harvest in December 1877 and January 1878 had the effect of still further decreasing the numbers to be relieved. In February and March they increased again, but in May the rice harvest dispersed the gangs, who were encouraged by the seasonable weather to plough and sow their fields. Simultaneously with the increase on relief-works the numbers in receipt of gratuitous relief decreased, so that at the beginning of 1878 the relief camps were little more than hospitals. By

¹ R., p. 36.² R., p. 40.³ R., p. 60.⁴ R., p. 74-5.

the end of May all danger was past, and the famine establishments were at once reduced.

3. *Relief-work*.—During the earlier period of the famine the system of relief-works pursued was, with few exceptions, that of carrying out numerous small works such as repairs to tanks and metalling of roads, which were conducted under the orders of the district officers. The undoubted utility of these works secured at first the sanction of the Government of India, and the system was also approved by Sir R. Temple, on the understanding that large works were ready, should the necessity for them arise. The works were of a kind which were ordinarily conducted by the district officers, and as such were well suited for their purpose. The method, however, under which they were planned was cumbrous and the system of granting money uncertain. Certain sums were allotted to a district, and distributed to the taluqs according to their needs.¹ None of the money could, however, be touched till it had been definitely appropriated to a particular work, estimates drawn up, and sanction obtained from the Commissioner or Chief Commissioner according to the amount. The district officers in practice had no time to comply with all these forms, and the work was badly carried on through lack of supervision, money ran short for want of the necessary sanction having been obtained, and works had to be closed, and reopened capriciously. The people were thus discouraged and prevented from coming to work. But the final cause of the collapse of the system was an oversight which arose out of the routine observed in all the earlier famine procedure. A rule of the Public Works Department had been adopted to the effect that all grants not fully utilised before the close of the financial year should lapse. No arrangements were made to withdraw it, when it was seen that the necessity for relief-works would continue. Consequently the works were closed, and the district officers, with no power to assist, were surrounded by starving wretches howling for employment, who were thrown out of work by the sudden cessation of funds. Though measures were at once taken to remedy the mistake, the people were thoroughly disgusted with the fitful nature of their employment, and the works were never again put on a proper footing till the new arrangement ordered by the Viceroy came into force in September 1877. The consequence was an immediate falling off in the numbers on relief-works from 55,687 in the last week of March to 32,000 in the first week of April, and from thenceforth they oscillated from that figure to 25,000.

The unsteadiness of the attendance at the Civil Relief Works, owing to the above-mentioned reasons, may be best seen by the following table:—

Month.	Average No. on Civil Relief Works.					
January	-	-	-	-	-	20,870
February	-	-	-	-	-	37,830
March	-	-	-	-	-	41,730
April	-	-	-	-	-	29,730
May	-	-	-	-	-	30,010
June	-	-	-	-	-	28,060
July	-	-	-	-	-	26,300
August	-	-	-	-	-	26,000
September	-	-	-	-	-	29,970

The Public Works Department were also enjoined to co-operate with the district officers, but co-operation was never hearty. Their system was not altered to suit the altered circumstances. The work was done by petty contract and the labourers paid on the piece-work system at ordinary rates, which were insufficient to enable those unaccustomed to work, especially when emaciated by famine and illness, to earn a living. Again in many cases the labourers were only paid once in 15 days. Consequently the works conducted by the Public Works Department did but little towards relieving the famine.

An attempt was made in the latter end of July to put matters on a better footing, and proposals were made with the view of establishing a system of large relief-works and placing them under the control of the Public Works Department, and relieving the over-worked district officers of this portion of their duties. It was also suggested that, whereas a larger sum of money was being spent on gratuitous relief than on relief-works, the reverse ought to be the case. These views made a great impression on the Chief Commissioner; but as they were opposed by the Chief Engineer, and as in a conference summoned to consider them the divergence of opinion was so great that no decision could be come to, a proposal which might have saved much suffering to the starving people fell to the ground.

¹ R., p. 45, 50.

On the visit of the Viceroy in September 1877, the system which had proved so successful in Bombay was substituted. The main outlines of the system were that all relief-works should be large works of permanent utility and should be conducted under officers of the Public Works Department: and that all applicants for employment should be received on them. The labourers were classified according to their strength and ability to work and suitable tasks allotted to them; the wage was so arranged as to leave a slight margin for comforts over and above actual subsistence, and this margin, but no more, might be deducted as a penalty for idleness: the wage was paid daily at first and afterwards twice a week, under the supervision of competent officers. It was laid down that work should not be given to any near their homes, but in most cases this test was not enforced, as the severity of the famine did away with its necessity. The Public Works Budget was entirely revised and no work was undertaken which was not suitable for relief purposes.

The following statement gives the average numbers on relief-works, as far as the provincial returns contain the information each month from December 1876 to July 1878, the average monthly attendance for the whole period, and the total cost of relief-works:—

Year.	Month.	Civil Relief.	P.W.D. Works.
1876	December - -	15,000	20,000
1877	January - -	20,870	20,000
	February - -	37,830	28,780
	March - -	41,730	30,950
	April - -	29,730	31,500
	May - -	30,010	32,500
	June - -	28,060	26,800
	July - -	26,300	20,750
	August - -	26,000	22,600
	September - -	29,970	25,800
	October - -	30,200	44,000
	November - -	75,550	
	December - -	55,273	
1878	January - -	45,197	
	February - -	46,834	
	March - -	55,742	
	April - -	54,369	
	May - -	45,890	
	June - -	37,630	
	July - -	33,425	
	Total - -	1,069,290	
	Average monthly attendance for 20 months - -	53,470	
	Total cost -	Rs. 29,50,000	

4. *Relief wages.*—The first attempt at establishing a uniform scale of wages was made on the 15th November. A circular was issued, suggesting that the rate should not exceed $2\frac{1}{2}$ annas for a male adult, and $1\frac{1}{2}$ for a female. No positive orders were, however, passed on the subject till the 28th February. At that date a rate of grain-wage was fixed, in case grain payments were made, “which for the present should not be done unless under exceptional circumstances.” The rate was—

For a man $1\frac{1}{2}$ lb. of ragi ¹	-	-	-	6 pies condiments.
For a woman $1\frac{1}{4}$ lb. of ragi ²	-	-	-	3 „ „
For a child under $14\frac{3}{4}$ lb. of ragi ³	-	-	-	3 „ „

At the then price of grain these wages were equal respectively to 2, $1\frac{1}{2}$, and 1 anna respectively. If prices grew dearer, wages were to rise proportionally. The rate of piece-work was at the same time laid down for relief-works at 1 anna 6 pies per cubic yard. The efficiency of these rules, however, was seriously impaired by their being only permissive, and they were not generally adopted in the Public Works Department works. On July 21st, however, the chief engineer issued a circular, authorising the

¹ R., p. 45.

² R., p. 51.

³ R., p. 105.

reduction of tasks by 25 per cent. in special cases, sanctioning a sliding scale of wages on the basis of $\frac{2}{3}$ seer of rice, with an extra allowance for condiments, for working men; $\frac{2}{3}$ rds of this amount for women, and $\frac{1}{2}$ for children, and daily payments under certain conditions not stated. The instructions contained in the circular were not, however, uniformly carried out.

In the Civil Works, a similar sliding scale was introduced by a circular dated 8th August. But in neither of these orders was any explanation given how this principle of a daily wage could be reconciled with the prevailing system of piece-work. The Famine Code for the first time put the question on a uniform and practical basis. Definite rules were laid down regarding the classing of the labourers, and the amount of work, never exceeding 75 per cent. of an ordinary task, to be required from each class; also regarding the payments, the existing rate of wage being generally accepted, as fixed by the circulars of 21st July and 8th August.

5. *Piece-work*.—The question of piece-work versus task-work is one which occupied a prominent place in the re-arrangement of affairs consequent on the appointment of the Famine Department.¹ The theoretic objections to piece-work for famine-relief purposes are, (1) a skilful labourer may earn more than a bare subsistence, and thus the work prove too attractive, (2) coolies may be stimulated to work with too great vigour and thus the work may be completed before the famine is over, (3) if a piece of work is paid for in the lump it is impossible to ensure a fair distribution of the pay among those who shared in the work, (4) the strength and skill of famine coolies vary so much that it is impossible to apportion the rate so as to bear an equal relation in all cases to their ability to work.

The system had proved a failure under the earlier régime, when the rules of the Public Works Department were not sufficiently elastic to allow of special modifications, but it was tried on the State railway with unaltered rates of pay, and the practical conclusion drawn from the facts and experience gained was, that on all large works there should be a piece-work gang, to which all the able-bodied should be drafted, and as many others as might wish it; that the system should only be tried in places where the quantity of work can be easily estimated by the labourers themselves, and the rate remain unaltered for a long period; but that the attempt to carry on famine relief solely on a system of piece-work payments must necessarily result in failure.

6. *Gratuitous relief*.—The principle on which gratuitous relief was administered during the famine was, that of co-operation between the public and the Government, the primary responsibility, both for raising the funds and for managing their distribution, being vested in the public. The idea of distributing cooked food to starving people was not an unfamiliar one in Southern India, and private endowed charities of this nature already existed in the Province. These were naturally utilised when the want began to be severely felt, but as the distress increased, these sources of charity were soon dried up. Grants had then to be made by Government in certain cases, and in others, as at Bangalore, the Government supplemented private subscriptions by an equivalent grant. Towards the end of January, however, private charity was almost exhausted, except at Bangalore itself, and the Government had to undertake the whole cost of the work. At Bangalore the administration of this relief was left entirely in the hands of the Central Relief Committee till they applied for Government supervision, a measure which proved very effectual in producing economy. One evil which attended this form of relief was the want of uniformity in the rations of food, and towards the end of March the Chief Commissioner prescribed a scale,² viz., for an adult 45 tolas (1½ lb.) of ragi flour or 40 tolas (1 lb.) of rice, with 3 pies worth of condiments, and for a child under 10, half that amount. Additional measures were taken in May for enforcing this regulation.

Those paupers, however, who did some slight work were allowed a larger, but undefined ration; a modification which caused great confusion, and gave great openings for fraud. The number of kitchens was a fluctuating one, but tended gradually to increase, and at the highest time there were as many as 151² of these institutions, a number which in default of any increase to the ordinary district establishment, proved fatal to all effectual supervision. In January the numbers who received food at these kitchens were estimated at about 15,000, but by the end of March they had risen to about 58,000, and from that time they went on constantly increasing. In August, owing to the increasing emaciation of the paupers in Bangalore, a higher scale of ration was introduced which had the effect of increasing the attraction of the paupers from a distance to that

¹ R., p. 140, 156-159.

² R., p. 59.

city. The returns for the whole province give the numbers at this date in receipt of gratuitous relief as 227,000. After the visit of the Viceroy in September, the necessity for using the machinery of a voluntary committee in distributing relief in Bangalore no longer existed, and the whole system was centralised under the Famine Department, and the necessary reforms were at once taken in hand. In the new Famine Code distinct instructions were given for administering this form of relief, and separate duties were assigned to separate officers. The Medical Department was strengthened and regular rules issued to provide against undue harshness in the operation of the tests and to secure the proper working of the relief measures. A uniform scale of 1 lb. of ragi with pulse and condiments for adult non-workers, half as much for a child under 12, and $1\frac{1}{2}$ lbs. for a working man was adopted. The open kitchens were reduced in number and converted into enclosed relief camps. The able-bodied were drafted to the relief works, and the infirm and sick to the relief camps.

The following statement gives the monthly average numbers in receipt of gratuitous relief from December 1876 to July 1878, the average numbers for the first 11 and last 9 months and the total cost of this form of relief:—

1876.	December	-	-	-	-	15,000
1877.	January	-	-	-	-	20,000
	February	-	-	-	-	25,000
	March	-	-	-	-	43,600
	April	-	-	-	-	69,570
	May	-	-	-	-	103,400
	June	-	-	-	-	114,100
	July	-	-	-	-	145,000
	August	-	-	-	-	199,300
	September	-	-	-	-	179,490
	October	-	-	-	-	81,870
	Average for 11 months	-	-	-	-	90,575
	November	-	-	-	-	33,200
	December	-	-	-	-	15,000
1878.	January	-	-	-	-	7,000
	February	-	-	-	-	3,700
	March	-	-	-	-	5,400
	April	-	-	-	-	10,200
	May	-	-	-	-	10,900
	June	-	-	-	-	12,200
	July	-	-	-	-	13,000
	Average for 9 months	-	-	-	-	12,300
Total cost						Rs. 31,25,000.

7. *Emigration and wandering*.—Closely connected with the subjects of relief-works and gratuitous relief are the questions of emigration and wandering. In the earlier months there was a great influx from Mysore into the adjoining Madras districts of Bellary and Cuddapah on the N. and N.E. and the Nilgiris on the S.W.; and a considerable controversy arose between the two administrations as to the method of dealing with the question. The Madras Government demanded from Mysore a contribution towards the relief of the immigrants, which the Mysore Administration refused on the ground that the migration was caused not by any deficiency of relief in Mysore, but by the high rate of wages given in Madras, which tempted away persons who were not in need of relief; and this contention received confirmation from the fact that on the assimilation of the rate of wages in Madras to that in Mysore the stream of emigration was almost entirely checked. In the meantime, however, a system of forcible deportation was adopted, which led to great confusion and trouble.

The ordinary immigration of coolies into the coffee districts of the Wynad also very much increased in 1877, and the planters, while they complained of the influx of weak and sickly people, dreaded lest any order prohibiting immigration should deprive them of their ordinary supply of labour. The district officers attempted to check it by selecting those who seemed sickly or feeble and relegating them to their homes in carts; but this was very unsuccessful. After the Viceroy's visit it was decided not to

prevent migration, but to provide relief at the places, where it was needed by opening relief-works and hospitals: and this was done in Courg and the Wynad with fairly good results. Wandering villagers also throughout the period of distress constantly found their way to the large district towns, partly impelled by a natural instinct to resort to the district centres, and partly attracted by the prospect of a gratuitous distribution of food. In order to check this evil a system of relegating them back to their homes was arranged in March 1877. Roadside stations were established which were intended to intercept the villagers, and to be depôts to which they might be sent from the large towns, and from which they might be forwarded to their homes, after receiving an allowance of uncooked food. In practice, however, the system was a failure. It was impossible to force the villagers to go home against their will, or, if they did go home, to stay there. The people were very loth to go and escaped from their escorts on all sides.

Under the reformed system, all attempts at "relegation" were abandoned, the rule being laid down that all persons in need of relief should be treated in the same way, from whatever country they might have come.

Charitable relief.—The sum of Rs. 16,53,900 was apportioned to Mysore by the Madras Government out of the subscriptions received from England and the Colonies for the relief of famine in the South of India. The money was administered by the Central Committee, who distributed it according to the best information they could get regarding the relative necessities of the various taluqs. It was at first expended partly in hospital necessaries, and partly in clothes, but this latter form of relief fell into disrepute and was discontinued. However, the experience of a month established the principle, that the main use to which the money should be put was to restore the people to their ante-famine condition by providing them with implements and bullocks. The money was not to be frittered away in small gifts, but each man was to receive sufficient to give him a new start in life. Another use to which part of the subscriptions was applied was to establish orphanages and other charitable institutions, and the amount of good done to the people by these means is almost incalculable.

8. *Crime.*—A very serious feature of the famine times was the increase of crime. The average number of crimes (dacoity, robbery, burglary, and theft) before the famine was only about 25 per month. The increase during the famine months may be seen from the following table:—

District.	Average monthly Number.				Average monthly Number of Arrests.					
	Jan. to Aug. 1876.	Sept. to Dec. 1876.	Jan. to March 1877.	April to Aug. 1877.	Sept. to Dec. 1877.	Jan. to Aug. 1876.	Sept. to Dec. 1876.	Jan. to March 1877.	April to Aug. 1877.	Sept. to Dec. 1877.
Bangalore - - -	20.25	105.50	173.00	264.2	203.00	21.60	104.50	222.0	425.4	365.00
Kolar - - -	38.75	84.00	204.00	365.2	211.20	52.60	307.00	348.0	602.0	327.00
Tumkur - - -	14.50	65.50	73.00	113.2	94.50	15.50	157.50	196.0	292.0	277.00
Mysore - - -	50.00	61.50	54.50	135.2	193.00	39.00	41.25	45.0	166.8	275.00
Hassan - - -	22.10	33.50	97.50	162.4	161.75	31.10	98.75	138.3	174.0	212.25
Kadur - - -	23.00	28.00	22.50	66.4	87.00	53.10	116.25	58.3	122.2	180.25
Shimoga - - -	30.60	34.75	38.60	98.4	54.75	41.00	35.00	47.3	178.2	109.00
Chitaldrug - - -	18.10	40.25	105.00	212.2	97.75	57.10	135.20	212.6	396.8	180.75
Total - - -	217.60	456.00	767.50	1416.2	1105.2	311.00	995.00	1267.0	2357.0	1926.0

During the height of the famine, lawlessness and insecurity of life prevailed to such an extent that whole hamlets were deserted, and the inhabitants flocked into the larger villages for security. The waste which resulted was terrible. Flocks of sheep were killed, and the greater part of the meat wasted. Ragi pits were plundered, and the greater part of the valuable stock scattered on the ground. The roads, however, were patrolled by the police, and were never rendered impassible.

9. *Area, Population, and Extent of Distress.*—The area of the 38 taluqs most severely affected by famine was 15,249 square miles, with a population according to the Census of 1871 of 2,673,198. In addition to these the distress was severe, though not intense, in 13 taluqs, the acre of which amounted to 3,840 square miles, and the population to

improved, and were only again stimulated in January by the rise in prices consequent on the revulsion of feeling which resulted from the failure of the ragi crop.

The total importations of grain by rail were as follows :—

Year.	Month.	Tons.	Daily Average. Tons.
1876	November - - -	9,943	331½
	December - - -	11,562	373
1877	January - - -	11,259	363
	February - - -	13,130	469
	March - - -	15,282	493
	April - - -	13,025	465
	May - - -	14,542	519
	June - - -	17,637	504
	July - - -	19,151	684
	August - - -	22,261	636
	September - - -	17,093	610
	October - - -	11,876	424
	November - - -	17,189	491
	December - - -	4,267	152
1878	January - - -	5,719	204
	February - - -	5,902	211
	March - - -	8,848	253
	April - - -	4,035	144
	May - - -	5,473	156
	June - - -	3,806	136
	July - - -	5,179	185
	Total - - -	237,179	—
	Monthly average - -	11,294½	—
	Daily average - -	371½	—

11. *Mortality.*—The mortuary returns of the Province are extremely incomplete, the average number of deaths returned scarcely ever exceeding 10 per mille in the four years from 1872 to 1875. In 1876 it rose to 10·7 per mille, and in 1877 it showed an immense increase to about 44 per mille. In 1878 the average fell again to about 14 per mille, the excess mortality in 1877 and 1878 as compared with the two preceding years being returned as 191,500.

The following statement shows the registered deaths by districts :—

Districts.	Population.	Number of Deaths.			Ratio per Mille.		
		1876.	1877.	1878.	1876.	1877.	1878.
Bangalore - -	828,354	8,958	47,468	10,624	10·8	57·3	12·8
Kolar - -	618,954	7,445	44,296	9,901	12·	71·5	15·9
Tumkur - -	632,239	5,367	35,322	8,264	8·4	55·8	13·
Mysore - -	943,187	7,019	27,212	10,957	7·4	28·3	11·6
Hassan - -	639,877	6,164	21,086	8,953	9·6	32·9	13·9
Shimoga - -	498,976	8,515	12,788	11,233	17·	25·6	22·5
Kudur - -	362,465	4,144	12,366	6,492	11·4	34·1	17·9
Chitaldrug - -	531,360	6,653	22,494	7,346	12·5	42·3	13·8
Total - -	5,055,412	54,265	223,033	73,770	Average 10·7	Average 44·1	Average 14·5

The true mortality, however, in ordinary years was probably about 35 per mille, and assuming that the rate of error in the returns was constant, the excess mortality in 1877–8 probably amounted to about 675,000. It is probable, however, that the returns for the famine years are even more erroneous than those for ordinary years, owing to disorganisation of the country and the circumstances of the returning officers. In the interval between the preliminary and final test census, in January 1878, it was shown that the rate of deaths amongst the stationary population (not including the wanderers) was 127·8 per mille, whereas the returns show a rate of only 44.

The most fatal month was August 1877, after which the mortality gradually declined from 27,555 to 5,551 in April 1878. From that point it rose again till it reached its second period of maximum in July 1878, when the registered deaths amounted to 69,241. After July it again declined till December, by which time it stood at about the level of the months before the famine.

The following statement shows the number of deaths, with the causes to which they were assigned :—

Causes.				1876.	1877.	1878.
Cholera	-	-	-	12,087	58,648	723
Small pox	-	-	-	1,059	5,922	971
Fevers	-	-	-	23,934	55,934	46,462
Bowel complaints	-	-	-	4,752	33,781	9,287
All other causes	-	-	-	12,483	68,748	16,327
Total	-	-	-	54,265	223,033	73,770

The most noticeable points in this connection are the great outbreak of cholera in 1877 and that of fever in October and November of the same year, both of which are believed to be largely attributable to the famine.

On the whole it is impossible to conclude that the excess mortality in the two years was less than 675,000, though the defectiveness of the returns makes any conclusions drawn from them somewhat doubtful.

12. *Test census.*—With a view to arrive at a clearer knowledge of the matter, a test census was taken on the night of 19th January, 1878, in a small division, of about 30 villages, in each of the talukas which had suffered most severely from famine. The work was done entirely by the superior officers, in order to insure accuracy. It was preceded by a preliminary census, and tested in every possible way, and was probably the most accurate ever taken in India. It was taken in 51 out of the 68 taluqs, and in 1454 villages. The total population discovered in these villages numbered 294,126. At the general census of 1871 they numbered 412,934—in other words the decrease was at the rate of 28·77 per cent.—which if applied to the whole province would give a total decrease, as compared with 1871, of 1,454,442, or assuming a normal rate of increase of population of $\frac{1}{2}$ per cent. per annum, 1,603,779. The test census of 1878 was, however, taken in all the worst taluqs, not in all the best; consequently, allowing for a better state of things in these taluqs, and for the absence of emigrants from their homes, who might be expected to return, the decrease may be reduced to about 1,300,000. There are, however, various other considerations which make an exact solution of the problem difficult, and an allowance of 5 per cent. should probably be made for possible error. One million one hundred thousand may then be safely taken as the minimum decrease of population, of which 50,000 may be due to diminished births, leaving a remainder of 1,050,000 as the actual number of deaths.

